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ORDER FOR SUPPLIES OR SERVICES SCHEDULE - CONTINUATION

IMPORTANT: Mark all packages and papers with contract and/or order numbers.

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DATE OF ORD		CONTRACT NO.				ORDER NO.	
10/18/20	19	68HERC19D0011				68HERC20F0025	
ITEM NO.		SUPPLIES/SERVICES	QUANTITY		UNIT PRICE	AMOUNT	QUANTITY ACCEPTED
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ORDER FOR SUPPLIES OR SERVICES SCHEDULE - CONTINUATION

PAGE NO

3 IMPORTANT: Mark all packages and papers with contract and/or order numbers. DATE OF ORDER CONTRACT NO. ORDER NO. 10/18/2019 68HERC19D0011 68HERC20F0025

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PERFORMANCE WORK STATEMENT

National Academy of Sciences (NAS)
Contract #68HERC19D0011
PR-ORD-19-01717
Task Order #68HERC20F0025

I. TITLE: Technical Expertise Support on Environmental Protection Agency (EPA) Scientific Issues and Topics

II. Task Order Contracting Officer Representative(s):

Task Order Contracting Officer Representative (TOCOR)

Name: Dahnish Shams Office: ORD/NCEA/IRIS

William Jefferson Clinton Building 1200 Pennsylvania Avenue, N.W. Mail Code: 8602R, Room No. 71205

Washington, DC 20460

Phone: (202) 564-2758

Email: shams.dahnish@epa.gov

Alternate Task Order Contracting Officer

Representative (Alt. TOCOR)

Name: Vicki Soto
Office: ORD/NCEA/IRIS

William Jefferson Clinton Building

1200 Pennsylvania Avenue, N.W. Mail Code: 8602R, Room No. 71205

Washington, DC 20460

Phone: (202) 564-3077

Email: soto.vicki@epa.gov

III. PERIOD OF PERFORMANCE: Date of Task Order award through 12 months following award.

IV. PURPOSE OF TASK ORDER

The purpose of this task order (TO) is to engage with the scientific community to address key science issues pertinent to the development of human and ecological assessments. This TO will (1) provide EPA with independent scientific and technical input from recognized experts for up to five (5) external or internal EPA-led meetings or workshops that will address key science issues, (2) convene National Academy of Sciences (NAS)-led workshops and/or meetings on topics related to the assessment methodology including systematic review, new approach methods (NAM), hazard identification, and dose-response, and (3) peer-review of draft assessment documents.

V. BACKGROUND

EPA's National Center for Environmental Assessment (NCEA) is a leader in the science of human health and environmental risk assessments. NCEA champions the development and use of health and environmental assessments by interacting with other agencies, the scientific community, industry, policy-makers, and the public. This TO would provide a mechanism and forum to discuss science topics and gain critical input from experts identified by the NAS. The NAS is widely viewed as an impartial, knowledgeable, and respected organization, capable of ensuring audience acceptance of products with which it is associated. The NAS is also able to provide EPA access to a full range of scientific and technical experts and to thoroughly screen such experts for conflicts of interests and a lack of impartiality.

VI. SCOPE OF WORK

The NAS shall provide the EPA with a mechanism to recruit NAS identified subject-matter experts and when necessary, provide a forum for discussion(s) on science topics pertinent to the development of human and ecological assessments. Forums may include either EPA or NAS-led meetings/workshops. EPA and NAS-led meetings and/or workshops shall address key science topics including, but not limited to systematic review, new assessment methods (NAM), hazard identification, dose-response, and other scientific issues identified relevant for peer-review of draft assessment documents.

VII. DESCRIPTION OF TASKS

Task 1. Recruitment of Technical Expertise to Support EPA Meetings and Workshops

Task 1 provides EPA with technical expertise input at internal and external meetings or workshops by experts identified by NAS. Identified experts shall be selected with consideration for insuring diversity of scientific perspective and the absence of conflicts of interest and a lack of impartiality. Identified experts shall substantially contribute to achieving a balanced consideration to address scientific and technical issues. The following tasks shall be performed for each of five (5) meetings or workshops to be specified by EPA.

Subtask 1.1 – Pre-Meeting: Convene a meeting between EPA and NAS to review assessments and scientific/technical issues to be discussed at meeting or workshop. NAS shall prepare a project milestone chart outlining the timeline for recruitment and check-ins. EPA will initiate a request for recruitment of experts through the generation of a one-page background document outlining the scope of the meeting/workshop and will also summarize scientific issues to be discussed at each meeting/workshop and any pertinent EPA work products(s).

EPA will notify NAS of the scientific/review topics anticipated to be discussed for each meeting or workshop approximately 90 days before the meeting. After notification, an initial meeting shall occur within seven (7) days of EPA identifying the topics and anticipated issues.

Subtask 1.2 – Recruit Experts: Identify a proposed group of up to four (4) subject matter experts (SMEs) who are (a) recognized experts in the field(s) relevant to the request, (b) represent a range of broadly recognized views on the issues identified by EPA, (c) are available to present and discuss their individual views at the meeting or workshop, and (d) have been evaluated for conflict of interest or lack of impartiality.

Subtask 1.3 – Post-Recruitment Meeting: Provide the EPA TOCOR a proposed list of SMEs including a biographical sketch, proposed area of expertise for each SME, and if there are any issues regarding potential conflict of interest (COI) or impartiality. Convene a meeting with the EPA and NAS to review the proposed list of SMEs.

EPA will provide comments on the proposed list regarding qualifications and COI/impartiality. NAS shall determine who will participate in each meeting or workshop. NAS shall then deliver a final list of participants.

Subtask 1.4 – Expert Logistic Support: NAS shall coordinate meeting logistics information (e.g., webinar and teleconference information) between EPA and the SMEs. Generally, these meetings are expected to be conducted via webinar but if necessary, NAS shall make arrangements for transportation, lodging and logistical support for each SMEs asked to participate in the meeting or workshop to be held in Washington, D.C.-or another location as specified by EPA-for up to two (2) meetings.

Subtask 1.5 – Comment Compilation: NAS shall compile non-consensus input from each SME on topics discussed at the meeting/workshop for delivery to EPA. NAS shall ensure that the compiled comments are in an appropriate format for EPA to post in Regulations.gov chemical-specific docket.

Task 2 – NAS-Led Meetings and Workshops to Support Assessment Development

NAS shall convene and facilitate up to two (2) workshop(s) and/or meeting(s) to support understanding of topic(s) pertinent to assessment development. The workshop(s) and/or meetings(s) are to assist EPA in increasing quality, transparency, and confidence in its assessments by discussing scientific and the public issues related to systematic review, hazard identification, new approach methods (NAM), doseresponse, and other issues. NAS shall provide recognized national and international experts an opportunity to discuss critical science topics relevant to NCEA's scientific activities (e.g., assessment development).

Subtask 2.1 – Initial meeting: Convene a meeting with the EPA and NAS to review the topics and issues to be discussed at the workshop(s). EPA will identify the topics and review issues via email anticipated to be discussed for each workshop approximately six months before the workshop. If necessary, EPA will provide a one-pager with the necessary background information. This preliminary meeting shall occur within seven (7) days of EPA identifying the topics and anticipated issues.

Subtask 2.2 – Establish a workshop planning committee: NAS shall establish an expert panel of up to 10 experts to organize up to two workshops following its procedures on committee composition, balance, and conflict of interest.

Subtask 2.2 – Establish a workshop agenda and a list of participants: NAS shall convene up to 15 experts to participate in the workshop. NAS shall identify and contact non-federal and federal subject matter experts who are (a) recognized experts in the field(s) and issues relevant to the workshop, (b) represent a range of recognized views on the issues identified by EPA, and (c) are available to present and discuss their research and individual views at the public workshop. Experts with an understanding of regulatory risk assessment (e.g., chemical hazards) are generally preferred. NAS shall provide the EPA TOCOR a proposed list of experts including a biographical sketch, proposed area of expertise for each expert, and if there are any issues regarding potential COI or impartiality. NAS shall convene a meeting with the EPA TOCOR and ORD management and technical staff to review the proposed list of experts. EPA may provide comments on the

proposed list regarding qualifications and COI/impartiality. NAS shall determine who will participate in the workshop.

Subtask 2.3. – Conduct the workshop(s)/meeting(s): NAS shall convene and facilitate up to two (2) workshops/meetings to discuss topics and/or issues pertinent to assessment development. In coordination with the NAS, EPA will provide a general description of the desired goals and outcomes of each workshop/meeting. NAS shall provide EPA with a list of all registrants and participants after the workshop/meeting via email.

Subtask 2.4. – Make arrangements for transportation, lodging and logistical support for each expert asked to participate in the workshop(s)/meeting(s).

NAS shall arrange provision for transportation, lodging, and any other logistical support for the experts' participation in the workshop(s)/meeting(s).

Task 3 - Review of EPA's Draft Assessment Document

EPA requests that NAS perform an expert external peer review on one (1) draft NCEA assessment or assessment materials (e.g., Toxicological Review of Inorganic Arsenic) to evaluate whether the scientific literature was adequately evaluated by EPA, and whether appropriate methods were used to synthesize the scientific evidence and arrive at the conclusions. The NAS expert peer review committee shall evaluate the assessment's conclusions using the charge questions set forth by EPA and shall not conduct an independent assessment. EPA will identify the topics and review issues via email. If necessary, EPA will provide a one-pager with the necessary background information. Task 3 will consist of three (3) subtasks.

Subtask 3.1. – Establish expert panel

EPA requests that NAS establish an expert panel of up to 15 experts following their procedures on committee composition, balance, and conflict of interest. Recommended areas of expertise include the following:

- Public health risk assessment expertise, especially current experience supporting
 regulatory decisions in the context of the available scientific information for public
 health and environmental protection (e.g., state risk assessors). It would be preferable if
 this expert(s) has demonstrated experience with systematic review methods for
 environmental exposures;
- Environmental epidemiology, especially in the areas of cancer, reproductive, and respiratory effects (i.e., multiple experts are needed);
- Toxicology, especially in the areas of respiratory effects, neurotoxicology, and/ or reproductive/developmental toxicology. It would be useful, but not essential, if one of these experts had experience with biological modeling (e.g., dosimetric modeling; physiologically-based modeling);
- Exposure measures for observational epidemiology studies of environmental and occupational exposures; and
- Dose-response analysis of environmental chemicals, especially current experience with data analysis for human exposure studies, including observational studies.

Subtask 3.2. – Conduct an independent external peer review and convene a meeting(s)

EPA requests that NAS conduct an independent external peer review of the draft NCEA assessment or assessment materials (e.g., Toxicological Review of Inorganic Arsenic). In coordination with NAS, EPA will transmit charge questions, along with the external peer review draft assessment materials, prior to the peer review. EPA also requests that NAS organize an external peer review meeting(s) for the peer review panel to discuss the draft assessment with EPA and to include an opportunity for public comment.

Subtask 3.3. – Prepare report based upon listed Tier Levels

The expert peer review committee shall develop, reflecting panel consensus where possible, a final report on their review and evaluation of the EPA document. Within the peer review report, the NAS shall promote clarity and the timely completion of the draft NCEA assessment materials (e.g., Toxicological Review of Inorganic Arsenic) by prioritizing and/or tiering recommendations provided to EPA under the following system:

Tier 1: Recommended Revisions— Important revisions for EPA to consider and address in order to improve the critical scientific concepts, issues, and/or narrative within the assessment.

Tier 2: Suggested Revisions – Revisions that are encouraged to strengthen or clarify the scientific concepts, issues, and/or narrative within the assessment but are not critical. Other factors (e.g., Agency practice and resources) may need to be considered by EPA before undertaking these revisions.

Tier 3: Future Considerations— Useful and potentially informative scientific exploration that may inform future evaluations of key science issues and/or inform the development of future assessments. These recommendations are likely outside the immediate scope and/or needs of the assessment under review.

VIII. Deliverables

The products of the NAS tasks for activity are as follows:

Task 1 Deliverables

- a) EPA requests that a template for a project milestone chart that will be applied to each meeting be provided to the EPA Contracting Officer (CO), Contract Level Contracting Officer Representative (CL COR), and TOCOR within 30 days of task initiation. This project milestone chart should detail the significant activities for each meeting/workshop, as well as expected progression of the deliverables.
- b) The primary products for each meeting/workshop are expected to be: (a) proposed and final lists of experts including biographical sketches, which will participate in each of the five (5) meetings or workshops specified by EPA, (b) review of potential COI and partiality issues for each expert and report of any potential issue to the EPA CO, CL COR, and ORD management, and (c) develop a document of compiled comments from each expert to provide to EPA that may be published externally.

c) Participation of the experts in ORD meetings or workshops. Arrangement and provision of transportation, lodging, and any other logistical support for the experts' participation in the meetings or workshops.

Task 2 Deliverables

- a) EPA requests that written progress reports be provided to the EPA CO, CL COR, and TOCOR quarterly and after each meeting including an update of the project milestones.
- b) For all public meetings requested, the EPA CO, CL COR, and TOCOR shall be informed via email of the time, location, and agenda of the meeting at least 45 days prior to the meeting. All communications regarding public meetings should go through the EPA CO, CL COR, and TOCOR. The NAS shall provide EPA with a final list of all meeting attendees and public commenters within five (5) business days of the meeting.
- c) The primary products for each review are expected to be: (a) proposed and final lists of experts including biographical sketches, which will participate in each of the two (2) meetings or workshops specified by EPA, and (b) review of potential COI and partiality issues for each expert and report of any potential issue to the EPA CO, CL COR, and ORD management.
- d) Arrangement and provision of transportation, lodging, and any other logistical support for the experts' participation in the workshops.
- e) If public websites or similar means are used to disseminate information to the public during the course of this task, the EPA CO, CL COR, and TOCOR shall be notified of the location of such information (e.g., websites), as well as relevant changes to them.

Task 3 Deliverables

- a) EPA requests that written progress reports be provided to the EPA CO, CL COR, and TOCOR quarterly and after each meeting including an update of the project milestones.
- b) For all public meetings requested, the EPA CO, CL COR, and TOCOR shall be informed via email of the time, location, and agenda of the meeting at least 45 days prior to the meeting. All communications regarding public meetings should go through the EPA CO, CL COR, and TOCOR. The NAS shall provide EPA with a final list of all meeting attendees and public commenters within five (5) working days of the meeting.
- c) The primary products for each review are expected to be: (a) proposed and final lists of experts including biographical sketches, (b) written confirmation that review of potential COI and partiality issues for each expert was completed and report of any potential issue to the EPA CO ORD management, and the public on the NAS website, (b any submitted public comments, and (c) a final consensus peer review report or summary.
- d) Arrangement and provision of transportation, lodging, and any other logistical support for the experts' participation in the workshops.
- e) If public websites or similar means are used to disseminate information to the public during the course of this task, the EPA CO and TOCOR shall be notified of the location of such information (e.g., websites), as well as relevant changes to them.

IX. ACCEPTANCE CRITERIA

The Contractor shall prepare high quality products and that are reproducible and transparent. Figures submitted shall be of high quality similar to presentations developed for national scientific forums and should be formatted as jpeg or TIFF files. Deliverables shall be edited for grammar, spelling, and logic flow, as well as, technical accuracy, completeness, timeliness, grammatically correct, free of typographical errors, and conformance with the specific task, charge and expertise and deliverables of this Performance Work Statement. The technical information shall be reasonable complete and presented in a logical, readable manner. Text deliverables shall be provided in Microsoft Word 2010, Adobe Acrobat or compatible format. Deliverables will be accepted upon review and approval by the TOCOR.

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NAME OF OFFEROR OR CONTRACTOR

National Academy of Sciences

ITEM NO.	SUPPLIES/SERVICES	QUANTITY	1	UNIT PRICE	AMOUNT
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PERFORMANCE WORK STATEMENT

National Academy of Sciences (NAS)
Contract #68HERC19D0011
PR-ORD-20-00642
Task Order #68HERC20F0025
Amendment 1

I. TITLE: Technical Expertise Support on Environmental Protection Agency (EPA) Scientific Issues and Topics

II. Task Order Contracting Officer Representative(s):

Task Order Contracting Officer Representative (TOCOR)

Name: Dahnish Shams
Office: ORD/CPHEA/CPAD

William Jefferson Clinton Building 1200 Pennsylvania Avenue, N.W. Mail Code: 8602R, Room No. 71205

Washington, DC 20460

Phone: (202) 564-2758
Email: shams.dahnish@epa.gov

Alternate Task Order Contracting Officer

Representative (Alt. TOCOR)

Name: Vicki Soto

Office: ORD/CPHEA/CPAD

William Jefferson Clinton Building 1200 Pennsylvania Avenue, N.W. Mail Code: 8602R, Room No. 71204

Washington, DC 20460

Phone: (202) 564-3077

Email: soto.vicki@epa.gov

III. PERIOD OF PERFORMANCE: Date of Task Order award through 12 months following award.

IV. PURPOSE OF TASK ORDER

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V. BACKGROUND

EPA's Center for Public Health and Environmental Assessment (CPHEA) is a leader in the science of human health and environmental risk assessments. CPHEA champions the development and use of health and environmental assessments by interacting with other agencies, the scientific community, industry, policy-makers, and the public. This TO would provide a mechanism and forum to discuss science topics and gain critical input from experts identified by the NAS. The NAS is widely viewed as an impartial, knowledgeable, and respected organization, capable of ensuring audience acceptance of products with which it is associated. The NAS is also able to provide EPA access to a full range of

scientific and technical experts and to thoroughly screen such experts for conflicts of interests and a lack of impartiality.

VI. SCOPE OF WORK

The NAS shall provide the EPA with a mechanism to recruit NAS identified subject-matter experts and when necessary, provide a forum for discussion(s) on science topics pertinent to the development of human and ecological assessments. Forums may include either EPA or NAS-led meetings/workshops. EPA and NAS-led meetings and/or workshops shall address key science topics including, but not limited to systematic review, new assessment methods (NAM), hazard identification, dose-response, and other scientific issues identified relevant for peer-review of draft assessment documents.

VII. DESCRIPTION OF TASKS

Task 1. Recruitment of Technical Expertise to Support EPA Meetings and Workshops

Task 1 provides EPA with technical expertise input at internal and external meetings or workshops by experts identified by NAS. Identified experts shall be selected with consideration for insuring diversity of scientific perspective and the absence of conflicts of interest and a lack of impartiality. Identified experts shall substantially contribute to achieving a balanced consideration to address scientific and technical issues. The following tasks shall be performed for each of three (3) meetings or workshops to be specified by EPA.

Subtask 1.1 – Pre-Meeting: Convene a meeting between EPA and NAS to review assessments and scientific/technical issues to be discussed at meeting or workshop. NAS shall prepare a project milestone chart outlining the timeline for recruitment and check-ins. EPA will initiate a request for recruitment of experts through the generation of a one-page background document outlining the scope of the meeting/workshop and will also summarize scientific issues to be discussed at each meeting/workshop and any pertinent EPA work products(s).

EPA will notify NAS of the scientific/review topics anticipated to be discussed for each meeting or workshop approximately 90 days before the meeting. After notification, an initial meeting shall occur within seven (7) days of EPA identifying the topics and anticipated issues.

Subtask 1.2 – Recruit Experts: Identify a proposed group of up to four (4) subject matter experts (SMEs) who are (a) recognized experts in the field(s) relevant to the request, (b) represent a range of broadly recognized views on the issues identified by EPA, (c) are available to present and discuss their individual views at the meeting or workshop, and (d) have been evaluated for conflict of interest or lack of impartiality.

Subtask 1.3 – Post-Recruitment Meeting: Provide the EPA TOCOR a proposed list of SMEs including a biographical sketch, proposed area of expertise for each SME, and if there are any issues regarding potential conflict of interest (COI) or impartiality. Convene a meeting with the EPA and NAS to review the proposed list of SMEs.

EPA will provide comments on the proposed list regarding qualifications and COI/impartiality. NAS shall determine who will participate in each meeting or workshop. NAS shall then deliver a final list of participants.

Subtask 1.4 – Expert Logistic Support: NAS shall coordinate meeting logistics information (e.g., webinar and teleconference information) between EPA and the SMEs. Generally, these meetings are expected to be conducted via webinar but if necessary, NAS shall make arrangements for transportation, lodging and logistical support for each SMEs asked to participate in the meeting or workshop to be held in Washington, D.C.-or another location as specified by EPA-for up to two (2) meetings.

Subtask 1.5 – Comment Compilation: NAS shall compile non-consensus input from each SME on topics discussed at the meeting/workshop for delivery to EPA. NAS shall ensure that the compiled comments are in an appropriate format for EPA to post in Regulations.gov chemical-specific docket.

Task 2 - NAS-Led Meetings and Workshops to Support Assessment Development

NAS shall convene and facilitate up to two (2) workshop(s) and/or meeting(s) to support understanding of topic(s) pertinent to assessment development. The workshop(s) and/or meetings(s) are to assist EPA in increasing quality, transparency, and confidence in its assessments by discussing scientific and the public issues related to systematic review, hazard identification, new approach methods (NAM), doseresponse, and other issues. NAS shall provide recognized national and international experts an opportunity to discuss critical science topics relevant to CPHEA's scientific activities (e.g., assessment development).

Subtask 2.1 – Initial meeting: Convene a meeting with the EPA and NAS to review the topics and issues to be discussed at the workshop(s). EPA will identify the topics and review issues via email anticipated to be discussed for each workshop approximately six (6) months before the workshop. If necessary, EPA will provide a one-pager with the necessary background information. This preliminary meeting shall occur within seven (7) days of EPA identifying the topics and anticipated issues.

Subtask 2.2 – Establish a workshop planning committee: NAS shall establish an expert panel of up to 10 experts to organize up to two workshops following its procedures on committee composition, balance, and conflict of interest.

Subtask 2.2 – Establish a workshop agenda and a list of participants: NAS shall convene up to 15 experts to participate in the workshop. NAS shall identify and contact non-federal and federal subject matter experts who are (a) recognized experts in the field(s) and issues relevant to the workshop, (b) represent a range of recognized views on the issues identified by EPA, and (c) are available to present and discuss their research and individual views at the public workshop. Experts with an understanding of regulatory risk assessment (e.g., chemical hazards) are generally preferred. NAS shall provide the EPA TOCOR a proposed list of experts including a biographical sketch, proposed area of expertise for each expert, and if there are any issues regarding potential COI or

impartiality. NAS shall convene a meeting with the EPA TOCOR and ORD management and technical staff to review the proposed list of experts. EPA may provide comments on the proposed list regarding qualifications and COI/impartiality. NAS shall determine who will participate in the workshop.

Subtask 2.3. – Conduct the workshop(s)/meeting(s): NAS shall convene and facilitate up to two (2) workshops/meetings to discuss topics and/or issues pertinent to assessment development. In coordination with the NAS, EPA will provide a general description of the desired goals and outcomes of each workshop/meeting. NAS shall provide EPA with a list of all registrants and participants after the workshop/meeting via email.

Subtask 2.4. – Make arrangements for transportation, lodging and logistical support for each expert asked to participate in the workshop(s)/meeting(s).

NAS shall arrange provision for transportation, lodging, and any other logistical support for the experts' participation in the workshop(s)/meeting(s).

Subtask 2.5 – Develop Workshop Output

NAS shall develop one (1) proceedings-in brief report and one (1) rapporteur report as an output. EPA will identify the appropriate output for each workshop.

Task 3 - Review of EPA's Draft Assessment Document

EPA requests that NAS perform an expert external peer review on one (1) draft CPHEA assessment (e.g., IRIS Toxicological Review) or supporting assessment materials (e.g., IRIS Handbook) to evaluate whether the scientific literature was adequately evaluated by EPA, and whether appropriate methods were developed and used to synthesize the current state-of-the science. The NAS expert peer review committee shall evaluate the assessment's conclusions using the charge questions set forth by EPA and shall not conduct an independent assessment. EPA will identify the topics and review issues via email. If necessary, EPA will provide a one-pager with the necessary background information. Task 3 will consist of three (3) subtasks.

Subtask 3.1. – Establish expert panel

EPA requests that NAS establish an expert panel of up to 15 experts following their procedures on committee composition, balance, and conflict of interest. Recommended areas of expertise include the following:

- Public health risk assessment expertise, especially current experience supporting
 regulatory decisions in the context of the available scientific information for public
 health and environmental protection (e.g., state risk assessors). It would be preferable if
 this expert(s) has demonstrated experience with systematic review methods for
 environmental exposures;
- Environmental epidemiology, especially in the areas of cancer, reproductive, and respiratory effects (i.e., multiple experts are needed);
- Toxicology, especially in the areas of respiratory effects, neurotoxicology, and/ or reproductive/developmental toxicology. It would be useful, but not essential, if one of

- these experts had experience with biological modeling (e.g., dosimetric modeling; physiologically-based modeling);
- Exposure measures for observational epidemiology studies of environmental and occupational exposures; and
- Dose-response analysis of environmental chemicals, especially current experience with data analysis for human exposure studies, including observational studies.

Subtask 3.2. – Conduct an independent external peer review and convene a meeting(s)

EPA requests that NAS conduct an independent external peer review of the draft CPHEA assessment or assessment materials (e.g., Toxicological Review of Inorganic Arsenic). In coordination with NAS, EPA will transmit charge questions, along with the external peer review draft assessment materials, prior to the peer review. EPA also requests that NAS organize an external peer review meeting(s) for the peer review panel to discuss the draft assessment with EPA and to include an opportunity for public comment.

Subtask 3.3. - Prepare report based upon listed Tier Levels

The expert peer review committee shall develop, reflecting panel consensus where possible, a final report on their review and evaluation of the EPA document. Within the peer review report, the NAS shall promote clarity and the timely completion of the draft CPHEA assessment materials (e.g., Toxicological Review of Inorganic Arsenic) by prioritizing and/or tiering recommendations provided to EPA under the following system:

Tier 1: Recommended Revisions— Important revisions for EPA to consider and address in order to improve the critical scientific concepts, issues, and/or narrative within the assessment.

Tier 2: Suggested Revisions – Revisions that are encouraged to strengthen or clarify the scientific concepts, issues, and/or narrative within the assessment but are not critical. Other factors (e.g., Agency practice and resources) may need to be considered by EPA before undertaking these revisions.

Tier 3: Future Considerations— Useful and potentially informative scientific exploration that may inform future evaluations of key science issues and/or inform the development of future assessments. These recommendations are likely outside the immediate scope and/or needs of the assessment under review.

VIII. Deliverables

The products of the NAS tasks for activity are as follows:

Task 1 Deliverables

a) EPA requests that a template for a project milestone chart that will be applied to each meeting be provided to the EPA Contracting Officer (CO), Contract Level Contracting Officer Representative (CL COR), and TOCOR within 30 days of task initiation. This project milestone

- chart should detail the significant activities for each meeting/workshop, as well as expected progression of the deliverables.
- b) The primary products for each meeting/workshop are expected to be: (a) proposed and final lists of experts including biographical sketches, which will participate in each of the five (5) meetings or workshops specified by EPA, (b) review of potential COI and partiality issues for each expert and report of any potential issue to the EPA CO, CL COR, and ORD management, and (c) develop a document of compiled comments from each expert to provide to EPA that may be published externally.
- c) Participation of the experts in ORD meetings or workshops. Arrangement and provision of transportation, lodging, and any other logistical support for the experts' participation in the meetings or workshops.

Task 2 Deliverables

- a) EPA requests that written progress reports be provided to the EPA CO, CL COR, and TOCOR quarterly and after each meeting including an update of the project milestones.
- b) For all public meetings requested, the EPA CO, CL COR, and TOCOR shall be informed via email of the time, location, and agenda of the meeting at least 45 days prior to the meeting. All communications regarding public meetings should go through the EPA CO, CL COR, and TOCOR. The NAS shall provide EPA with a final list of all meeting attendees and public commenters within five (5) business days of the meeting.
- c) The primary products for each review are expected to be: (a) proposed and final lists of experts including biographical sketches, which will participate in each of the two (2) meetings or workshops specified by EPA, and (b) review of potential COI and partiality issues for each expert and report of any potential issue to the EPA CO, CL COR, and ORD management.
- d) Arrangement and provision of transportation, lodging, and any other logistical support for the experts' participation in the workshops.
- e) If public websites or similar means are used to disseminate information to the public during the course of this task, the EPA CO, CL COR, and TOCOR shall be notified of the location of such information (e.g., websites), as well as relevant changes to them.
- f) Identified workshop report (proceedings-in brief or rapporteur report).

Task 3 Deliverables

- a) EPA requests that written progress reports be provided to the EPA CO, CL COR, and TOCOR quarterly and after each meeting including an update of the project milestones.
- b) For all public meetings requested, the EPA CO, CL COR, and TOCOR shall be informed via email of the time, location, and agenda of the meeting at least 45 days prior to the meeting. All communications regarding public meetings should go through the EPA CO, CL COR, and TOCOR. The NAS shall provide EPA with a final list of all meeting attendees and public commenters within five (5) working days of the meeting.
- c) The primary products for each review are expected to be: (a) proposed and final lists of experts including biographical sketches, (b) written confirmation that review of potential COI and partiality issues for each expert was completed and report of any potential issue to the EPA CO

- ORD management, and the public on the NAS website, (b any submitted public comments, and (c) a final consensus peer review report or summary.
- d) Arrangement and provision of transportation, lodging, and any other logistical support for the experts' participation in the workshops.
- e) If public websites or similar means are used to disseminate information to the public during the course of this task, the EPA CO and TOCOR shall be notified of the location of such information (e.g., websites), as well as relevant changes to them.

IX. ACCEPTANCE CRITERIA

The Contractor shall prepare high quality products and that are reproducible and transparent. Figures submitted shall be of high quality similar to presentations developed for national scientific forums and should be formatted as jpeg or TIFF files. Deliverables shall be edited for grammar, spelling, and logic flow, as well as, technical accuracy, completeness, timeliness, grammatically correct, free of typographical errors, and conformance with the specific task, charge and expertise and deliverables of this Performance Work Statement. The technical information shall be reasonable complete and presented in a logical, readable manner. Text deliverables shall be provided in Microsoft Word 2010, Adobe Acrobat or compatible format. Deliverables will be accepted upon review and approval by the TOCOR.

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National Academy of Sciences

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	www2.epa.gov/financial/contracts				
	Durham NC 27711				
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National Academy of Sciences

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	RTP-Finance Center (AA216-01) 109 TW Alexander Drive www2.epa.gov/financial/contracts				
	Durham NC 27711 Period of Performance: 10/18/2019 to 10/17/2021				

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52.204-25 Prohibition on Contracting for Certain Telecommunications and Video Surveillance Services or Equipment.

As prescribed in 4.2105(b) and in the applicability instructions in interim FAR Case 2019-009, insert the following clause:

Prohibition on Contracting for Certain Telecommunications and Video Surveillance Services or Equipment (Aug 2020)

(a) <u>Definitions</u>. As used in this clause—

Backhaul means intermediate links between the core network, or backbone network, and the small subnetworks at the edge of the network (e.g., connecting cell phones/towers to the core telephone network). Backhaul can be wireless (e.g., microwave) or wired (e.g., fiber optic, coaxial cable, Ethernet).

Covered foreign country means The People's Republic of China.

Covered telecommunications equipment or services means—

- (1) Telecommunications equipment produced by Huawei Technologies Company or ZTE Corporation (or any subsidiary or affiliate of such entities);
- (2) For the purpose of public safety, security of Government facilities, physical security surveillance of critical infrastructure, and other national security purposes, video surveillance and telecommunications equipment produced by Hytera Communications Corporation, Hangzhou Hikvision Digital Technology Company, or Dahua Technology Company (or any subsidiary or affiliate of such entities);
- (3) Telecommunications or video surveillance services provided by such entities or using such equipment; or
- (4) Telecommunications or video surveillance equipment or services produced or provided by an entity that the Secretary of Defense, in consultation with the Director of National Intelligence or the Director of the Federal Bureau of Investigation, reasonably believes to be an entity owned or controlled by, or otherwise connected to, the government of a covered foreign country.

Critical technology means-

- (1) Defense articles or defense services included on the United States Munitions List set forth in the International Traffic in Arms Regulations under subchapter M of chapter I of title 22, Code of Federal Regulations;
- (2) Items included on the Commerce Control List set forth in Supplement No. 1 to part 774 of the Export Administration Regulations under subchapter C of chapter VII of title 15, Code of Federal Regulations, and controlled-

- (i) Pursuant to multilateral regimes, including for reasons relating to national security, chemical and biological weapons proliferation, nuclear nonproliferation, or missile technology; or
 - (ii) For reasons relating to regional stability or surreptitious listening;
- (3) Specially designed and prepared nuclear equipment, parts and components, materials, software, and technology covered by part 810 of title 10, Code of Federal Regulations (relating to assistance to foreign atomic energy activities);
- (4) Nuclear facilities, equipment, and material covered by part 110 of title 10, Code of Federal Regulations (relating to export and import of nuclear equipment and material);
- (5) Select agents and toxins covered by part 331 of title 7, Code of Federal Regulations, part 121 of title 9 of such Code, or part 73 of title 42 of such Code; or
- (6) Emerging and foundational technologies controlled pursuant to section 1758 of the Export Control Reform Act of 2018 (50 U.S.C. 4817).

Interconnection arrangements means arrangements governing the physical connection of two or more networks to allow the use of another's network to hand off traffic where it is ultimately delivered (e.g., connection of a customer of telephone provider A to a customer of telephone company B) or sharing data and other information resources.

Reasonable inquiry means an inquiry designed to uncover any information in the entity's possession about the identity of the producer or provider of covered telecommunications equipment or services used by the entity that excludes the need to include an internal or third-party audit.

Roaming means cellular communications services (e.g., voice, video, data) received from a visited network when unable to connect to the facilities of the home network either because signal coverage is too weak or because traffic is too high.

Substantial or essential component means any component necessary for the proper function or performance of a piece of equipment, system, or service.

(b) Prohibition. (1) Section 889(a)(1)(A) of the John S. McCain National Defense Authorization Act for Fiscal Year 2019 (Pub. L. 115-232) prohibits the head of an executive agency on or after August 13, 2019, from procuring or obtaining, or extending or renewing a contract to procure or obtain, any equipment, system, or service that uses covered telecommunications equipment or services as a substantial or essential component of any system, or as critical technology as part of any system. The Contractor is prohibited from providing to the Government any equipment, system, or service that uses covered telecommunications equipment or services as a substantial or essential component of any system, or as critical technology as part of any system, unless an exception at paragraph (c) of this clause applies or the covered telecommunication equipment or services are covered by a waiver described in FAR 4.2104.

- (2) Section 889(a)(1)(B) of the John S. McCain National Defense Authorization Act for Fiscal Year 2019 (Pub. L. 115-232) prohibits the head of an executive agency on or after August 13, 2020, from entering into a contract, or extending or renewing a contract, with an entity that uses any equipment, system, or service that uses covered telecommunications equipment or services as a substantial or essential component of any system, or as critical technology as part of any system, unless an exception at paragraph (c) of this clause applies or the covered telecommunication equipment or services are covered by a waiver described in FAR 4.2104. This prohibition applies to the use of covered telecommunications equipment or services, regardless of whether that use is in performance of work under a Federal contract.
 - (c) Exceptions. This clause does not prohibit contractors from providing—
- (1) A service that connects to the facilities of a third-party, such as backhaul, roaming, or interconnection arrangements; or
- (2) Telecommunications equipment that cannot route or redirect user data traffic or permit visibility into any user data or packets that such equipment transmits or otherwise handles.
 - (d) Reporting requirement.
- (1) In the event the Contractor identifies covered telecommunications equipment or services used as a substantial or essential component of any system, or as critical technology as part of any system, during contract performance, or the Contractor is notified of such by a subcontractor at any tier or by any other source, the Contractor shall report the information in paragraph (d)(2) of this clause to the Contracting Officer, unless elsewhere in this contract are established procedures for reporting the information; in the case of the Department of Defense, the Contractor shall report to the website at https://dibnet.dod.mil. For indefinite delivery contracts, the Contractor shall report to the Contracting Officer for the indefinite delivery contract and the Contracting Officer(s) for any affected order or, in the case of the Department of Defense, identify both the indefinite delivery contract and any affected orders in the report provided at https://dibnet.dod.mil.
- (2) The Contractor shall report the following information pursuant to paragraph (d)(1) of this clause
- (i) Within one business day from the date of such identification or notification: the contract number; the order number(s), if applicable; supplier name; supplier unique entity identifier (if known); supplier Commercial and Government Entity (CAGE) code (if known); brand; model number (original equipment manufacturer number, manufacturer part number, or wholesaler number); item description; and any readily available information about mitigation actions undertaken or recommended.
- (ii) Within 10 business days of submitting the information in paragraph (d)(2)(i) of this clause: any further available information about mitigation actions undertaken or recommended. In addition, the Contractor shall describe the efforts it undertook to prevent use or submission of covered telecommunications equipment or services, and any additional efforts that will be incorporated to prevent future use or submission of covered telecommunications equipment or services.

(e) *Subcontracts*. The Contractor shall insert the substance of this clause, including this paragraph (e) and excluding paragraph (b)(2), in all subcontracts and other contractual instruments, including subcontracts for the acquisition of commercial items.

(End of clause)

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CAD US Environmental Protection 26 West Martin Luther King I Mail Code: W136 Cincinnati OH 45268-0001	Agency						
8. NAME AND ADDRESS OF CONTRACTOR (No., stree	t, county, State and	ZIP Code)	9A.	AMENDMENT OF SOLICITATION NO.			-
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CODE 041964057	FACILITY COD	E		0/18/2019			
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NAME OF OFFEROR OR CONTRACTOR

National Academy of Sciences

EM NO.	SUPPLIES/SERVICES	QUANTITY		UNIT PRICE	AMOUNT
(A)	(B)	(C)	(D)	(E)	(F)
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	Delivery Date changed from 10/17/2020 to				
	01/31/2022				
	Payment:				
	RTP Finance Center				
	US Environmental Protection Agency				
	RTP-Finance Center (AA216-01)				
	109 TW Alexander Drive				
	www2.epa.gov/financial/contracts				
	Durham NC 27711				
	Period of Performance: 10/18/2019 to 01/31/2022				

ORDER FOR SUPPLIES OR SERVICES									PAGE	PAGE OF PAGES	
IMPORTANT: Mark all packages and papers with contract and/or order numbers.									1	14	
1. DATE OF ORDER 2. CONTRACT NO. (If any) 68HERC19D0011					6. SHIP TO:						
68HERC19D0011 11/19/2019					a. NAME OF CONSIGNEE						
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3. ORDER NO. 4. REQUISITION/REFERENCE NO. 68HERC20F0055 PR-OCSPP-19-00425					OCSPP DC						
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US Environmental Protection Agency						(Division), MC:					
26 West Martin Luther King Drive						RM: WJC East Building					
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c.STREET ADDRESS 500 FIFTH STREET NW						REFERENCE YOUR:				Except for billing instructions on the reverse, this delivery order is	
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						Please furnish the following on the terms			this side only of this form and is issued subject to the terms and		
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d. CITY WASHINGTON e. STATE f. ZIP CODE DC 200012736					any, including delivery as indicated.				contract.		
9. ACCOUNTING AND APPROPRIATION DATA						10. REQUISITIONING OFFICE					
See Schedule						Office of Research and Development					
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ORDER FOR SUPPLIES OR SERVICES PAGE NO **SCHEDULE - CONTINUATION** 2 IMPORTANT: Mark all packages and papers with contract and/or order numbers. DATE OF ORDER CONTRACT NO. ORDER NO. 68HERC19D0011 68HERC20F0055 11/19/2019 ITEM NO. SUPPLIES/SERVICES QUANTITY UNIT UNIT **AMOUNT** QUANTITY ACCEPTED ORDERED PRICE (d) (a) (c) (e) (g) Guidance Document CO: Mark Cranley CS: William Yates, Contract Specialist Acquisition Division: CAD TOCOR: Bryan Lobar ALTOCOR: Stephanie Griffin CL COR: Glennis Reslock ALT CL COR: Jorge Rangel No IT Codes or FITARA necessary TOCOR: BRYAN LOBAR Max Expire Date: 05/18/2021 Admin Office: CAD US Environmental Protection Agency 26 West Martin Luther King Drive Mail Code: W136 Cincinnati OH 45268-0001 Accounting Info: 19-BT-69W-000CD6-2505-TC6ZXRN-2069DBCX01-001 BFY: 19 Fund: BT Budget Org: 69W Program (PRC): 000CD6 Budget (BOC): 2505 Cost: TC6ZXRN DCN - Line ID: 2069DBCX01-001 Period of Performance: 11/19/2019 to 05/18/2021 0001 487,538.00 New Task Order request under NAS Contract #68HERC19D0011 Task Order: #TBD Title: Strategy for Review of the Toxic Substances Control Act Systematic Review Guidance Document CO: Mark Cranley CS: William Yates, Contract Specialist Acquisition Division: CAD TOCOR: Bryan Lobar ALTOCOR: Stephanie Griffin

TOTAL CARRIED FORWARD TO 1ST PAGE (ITEM 17(H))

CL COR: Glennis Reslock ALT CL COR: Jorge Rangel

No IT Codes or FITARA necessary

\$487,538.00

PERFORMANCE WORK STATEMENT

National Academy of Science, Engineering and Medicine
Contract 68HERC19D0011
Task Order #68HERC20F0055

I. TITLE: Strategy for Review of the Toxic Substances Control Act Systematic Review Guidance Document

EAS Short Title: Strategy for Review of the TSCA SRG Document

II. Task Order Contracting Officer Representative(s):

Task Order Contracting Officer Representative (TOCOR)

Name: Bryan Lobar

Office:

OCSPP-OPPT-EAD-PAB 1200 Pennsylvania Ave NW, Mail code 7408M Washington, DC 20460

Phone: 202-564-7463

Email: lobar.bryan@epa.gov

Alternate Task Order Contracting Officer Representative (Alt. TOCOR)

Name: Stephanie Griffin

Office:

OCSPP-OPPT-TRIPD-RDB 1200 Pennsylvania Ave NW, Mail code 7410M Washington, DC 20460

Phone: 202-564-1463

Email: griffin.stephanie@epa.gov

III. PERIOD OF PERFORMANCE: Date of Task Order award through 12 months following award.

IV. PURPOSE OF TASK ORDER

The National Academy of Sciences (NAS) will evaluate EPA's Office of Chemical Safety and Pollution Prevention (OCSPP)'s Application of Systematic Review in TSCA Risk Evaluations document and supplementary materials and will develop a review strategy and a report to inform EPA of the recommend revisions to the document.

V. BACKGROUND

The Toxic Substances Control Act (TSCA) is the primary chemicals management law in the United States and was enacted to help ensure the protection of health and the environment against unreasonable risks from chemical substances. On June 22, 2016, the Frank R. Lautenberg Chemical Safety for the 21st Century Act (Pub. L. 114-182) was signed into law, effecting sweeping reforms to TSCA. The new law received significant bipartisan support in Congress and included substantial changes to the EPA's authorities and responsibilities. These amendments, as pertains to this task, include new mandatory deadlines and processes for the

EPA to evaluate existing chemicals; a risk-based standard for addressing unreasonable risks; and science standards such as the use of best available science and weight of evidence in risk evaluations.

TSCA section 6(b)(4) required the EPA to establish, by rule, a process to conduct risk evaluations on existing chemicals. Specifically, the EPA is directed to use this process to "determine whether a chemical substance presents an unreasonable risk of injury to health or the environment, without consideration of costs or other non-risk factors, including an unreasonable risk to a potentially exposed or susceptible subpopulation identified as relevant to the risk evaluation by the Administrator under the conditions of use." 15 U.S.C. 2605(b)(4)(A). TSCA sections 6(b)(4)(A) through (H) enumerate the deadlines and minimum requirements applicable to this process, including provisions that direct which chemical substances must undergo evaluation, the minimum components of an Agency risk evaluation, and the timelines for public comment and completion of the risk evaluation. The law also requires that the EPA operate in a manner that is consistent with the best available science and make decisions based on the weight of the scientific evidence. 15 U.S.C. 2625(h) and (i).

The EPA's final rule *Procedures for Chemical Risk Evaluation Under the Amended Toxic Substances Control Act* was published in June 2017 and expressed the EPA's intent to adopt systematic review principles to meet the statutory requirements of TSCA and enhance the transparency of the risk evaluation process. Systematic review is not explicitly defined in TSCA or in regulations, however EPA incorporated systematic review into the definition of "weight of scientific evidence". Section 26 of TSCA does require that EPA utilize weight of evidence when evaluating information to inform the risk evaluations. TSCA risk evaluations have a direct nexus to regulatory and risk management implications: if a TSCA risk evaluation identifies unreasonable risk, the EPA is required to eliminate the unreasonable risk.

The EPA's Office of Pollution Prevention and Toxics (OPPT) has begun building the TSCA program infrastructure to support systematic review and develop approaches and methods to gather, screen, evaluate and integrate multiple information streams (e.g., chemistry, fate, release and engineering information, exposure, environmental hazard, animal toxicity data, *in vitro* data, mode of action studies, epidemiological studies) for risk assessment purposes.

On June 1, 2018, OPPT published and solicited comments on the *Application of Systematic Review in TSCA Risk Evaluations* document. The guidance document describes the general systematic review principles and structured process for identifying, evaluating and integrating evidence. In the publication of this document, EPA stated "EPA/OPPT expects to document the progress of implementing systematic review in the draft risk evaluations and through revisions of this document and publication of supplemental documents".

The Application of Systematic Review in TSCA Risk Evaluations document introduces a detailed approach for assessing data quality using a scoring methodology for various information streams tailored to support TSCA risk evaluations. The EPA is using this document in the development of the first ten risk evaluations required under the TSCA amendments. The document also discusses general principles to integrate evidence with additional details included in the draft TSCA risk evaluations.

In addition to the *Application of Systematic Review in TSCA Risk Evaluations* document, the NAS will have the benefit of:

- the public comments on the document;
- EPA's responses to public comments; and
- The enumerated enhancements of OCSPP's systematic review process as incorporated into the first 10 risk evaluations (e.g., updates to the epidemiology sections).

The EPA expects to update the *Application of Systematic Review in TSCA Risk Evaluations* document to be responsive to the public comments received, the relevant comments of the Science Advisory Committee on Chemicals (SACC) peer reviews of the 10 risk evaluations, and the advice received from the NAS in its report to EPA while at the same time continuing to provide a transparent and robust systematic review process under the requirements of TSCA. EPA has learned a great deal in applying systematic review to the initial 10 risk evaluations; these learnings will inform subsequent risk evaluations.

VI. SCOPE OF WORK

The NAS shall evaluate EPA's Office of Chemical Safety and Pollution Prevention (OCSPP)'s *Application of Systematic Review in TSCA Risk Evaluations* document and supplementary materials and shall develop a report to inform EPA's OCSPP-of the required revisions to the document. See VII Description of Tasks below.

VII. DESCRIPTION OF TASKS

TASKS

The NAS shall convene a committee to review the *Application of Systematic Review in TSCA Risk Evaluations* (June 1, 2018) document. The tasks are the following:

1. Reporting Requirements: The contractor shall write and submit monthly progress reports to the Task Order Contracting Officer Representative (TOCOR). Progress reports shall describe completed work during the invoice period and should link to charges described in invoice documentation. Routine progress reports shall include a written monthly technical progress report that includes the following in the case of each project that the contractor is involved in during the month: (a) an overview of work accomplished since project inception to to-date (b) a description of work accomplished during the month, (c) a summary of QA/QC activities since project inception including a

summary of corrective action taken (d) a brief summary of anticipated work during the following month, (e) a summary and details of the costs incurred for each task during the month and cumulatively, and (f) total remaining budget. This report shall also be issued to the Contract-Level COR. Routine progress reports shall be delivered electronically; paper copies are not required.

- 2. The NAS will establish an expert committee following its procedures on committee composition, balance, and conflict of interest. Recommended areas of expertise are specified below. The EPA may offer suggestions of potential committee members to be considered by the NAS during its nominations process. EPA may also comment on the proposed committee membership during the 20-day comment period. The NAS shall ultimately select the committee members.
- 3. The NAS shall organize at least one (1) public committee meeting/workshop to discuss the charge to the committee and provide input to the committee in support of its report.
- 4. The NAS shall arrange for transportation, lodging and logistical support for each expert asked to participate in the public committee meeting/workshop to be held in Washington, D.C. or another location as specified by EPA.
- 5. The NAS shall convene the committee either via phone or in-person for deliberation following the public meeting/workshop and as needed to complete the final report.
- 6. The NAS shall write a report summarizing the NAS committee's findings and recommendations in response to the charge to the committee.

Charge to the Expert Committee

Specifically, the Committee shall answer and provide feedback:

- 1. Does the Application of Systematic Review in TSCA Risk Evaluations document (June 1, 2018) and any other supplemental material provided (e.g., peer review and public comment, and changes made during the application of the process) that reflect possible changes to the document, represent a comprehensive, workable, objective, and transparent process?
- 2. Given EPA's anticipated changes to the *Application of Systematic Review in TSCA Risk Evaluations* document (June 1, 2018), does the committee have further enhancements for EPA's consideration?

Provide EPA with expert advice with respect to potential updates to the *Application of Systematic Review in TSCA Risk Evaluations* document that would incorporate the lessons learned from the application of the guidance in the initial 10 TSCA risk evaluations and be responsive to public comments received.

Expertise Required

NAS shall identify a proposed group of subject matter experts to serve on the committee, not to exceed twelve (12), who:

- 1. are recognized experts in the fields relevant to the request including:
 - systematic review
 - exposure assessment
 - human health hazard and dose-response assessment
 - epidemiology
 - ecological and human health risk assessment

and

2. have been evaluated for conflict of interest or lack of impartiality in accordance with establish NAS procedures.

DELIVERABLES

- 1. Written monthly progress reports shall include work completed during the month, work projected for the next month, a summary of expenditures for the period, and cumulative expenditures through the end of the reporting period. The written progress reports shall be delivered via email to the TOCOR, Contract Level Contracting Officer Representative (CL COR), and CO.
- 2. Proposed and final lists of experts including biographical sketches who will participate in the public meeting(s)/workshop(s) to the TOCOR and report of any potential conflict of issue (if applicable) to the EPA CO.
- 3. Organization, hosting, note taking, and facilitation of at least one (1) public committee meeting/workshop regarding the subject of the charge to the committee.
- 4. Maintenance of a public "docket," available through the NAS website or Public Access Files that contains written public comments and presentations for the aforementioned meetings/workshops.
- 5. Participation of the experts in at least one (1) public committee meeting/workshop. Arrangement and provision of transportation, lodging, and any other logistical support for the experts' participation in the public committee meetings(s)/workshop(s).
- 6. Participation of the experts in subsequent meetings and/or conference calls.

 Arrangement and provision of transportation, lodging, and any other logistical support for the experts' participation in the (public) meeting and/or conference calls.
- 7. A report presenting the NAS committee's findings and recommendations regarding the charge of the committee and summarizing the process followed by the committee to develop those findings and recommendations will be delivered within 7 months of the TO award. The committee will strive to develop consensus where possible while describing the range of views for issues where a consensus cannot be reached.

VIII. ACCEPTANCE CRITERIA

The Contractor shall prepare high quality products that are reproducible and transparent. Figures submitted shall be of high quality similar to presentations developed for national scientific forums and should be formatted as jpeg or TIFF files. Technical accuracy, completeness, timeliness, grammatically correct, free of typographical errors, and conformance with the specific task, charge and expertise and deliverables of this Performance Work Statement. Text deliverables shall be provided in Microsoft Word 2010, Adobe Acrobat, or compatible format. Deliverables will be accepted upon review and approval by the TOCOR.

AMENDMENT OF SOLICITATION/MODIFIC	ATION OF CO	ONTRACT		1. CONTRACT ID CODE	PAGE	OF PAGES
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CS: William Yates, Contract	Speciali:	st				
Acquisition Division: CAD						
TOCOR: Bryan Lobar						
ALTOCOR: Stephanie Griffin CL COR: Glennis Reslock						
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Except as provided herein, all terms and conditions of the	ne document refe	renced in Item 9 A or 10A	, as he	retofore changed, remains unchanged and in f	ull force and e	ffect.
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	performance. All other conditions remain the				
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	US Environmental Protection Agency				
	RTP-Finance Center (AA216-01)				
	109 TW Alexander Drive				
	www2.epa.gov/financial/contracts				
	Durham NC 27711				
	Period of Performance: 11/19/2019 to 11/18/2020				

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CAD US Environmental Protection 26 West Martin Luther King D Mail Code: W136 Cincinnati OH 45268-0001									
8. NAME AND ADDRESS OF CONTRACTOR (No., street	t, county, State and .	ZIP Code)	<u> </u> 9	A. AMENDMENT OF SOLICITATION NO.		·			
National Academy of Sciences Attn: JAMES BURKE 500 FIFTH STREET NW WASHINGTON DC 200012736		-	9 x 16	B. DATED (SEE ITEM 11) 0A. MODIFICATION OF CONTRACT/ORDER N 8 HERC 1 9 D 0 0 1 1 8 HERC 2 0 F 0 0 5 5 0B. DATED (SEE ITEM 13)	0.				
CODE 041964057	FACILITY CODE			11/19/2019					
	11. THIS ITE	M ONLY APPLIES TO AM	MEND	MENTS OF SOLICITATIONS					
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	CT/ORDER IS MO H IN ITEM 14, PU	DDIFIED TO REFLECT TI RSUANT TO THE AUTH	HE A	DMINISTRATIVE CHANGES (such as changes and Y OF FAR 43.103(b).					
D. OTHER (Specify type of modification	and authority)								
E. IMPORTANT: Contractor X is not	is required to	sign this document and	retur	copies to the issuing	g office.				
14. DESCRIPTION OF AMENDMENT/MODIFICATION DUNS Number: 041964057 New Task Order request under	(Organized by UC	CF section headings, inclu	uding	solicitation/contract subject matter where feasib	*				
Task Order: #TBD					_				
Title: Strategy for Review o Document CO: Mark Cranley	f the Tox	kic Substance	es (Control Act Systematic R	eview G	uidance			
CS: William Yates, Contract	Specialis	st							
Acquisition Division: CAD									
TOCOR: Bryan Lobar									
ALTOCOR: Stephanie Griffin									
CL COR: Glennis Reslock									
Continued					Sall Record Condition	#1			
Except as provided herein, all terms and conditions of the 15A. NAME AND TITLE OF SIGNER (Type or print)	ne aocument reter	enced in item 9 A or TUA	16A. NAME AND TITLE OF CONTRACTING OFFICER (Type or print) William M. Yates						
15B. CONTRACTOR/OFFEROR	Т	15C. DATE SIGNED		. UNITED STATES OF AMERICA		16C. DATE SIGNED			
(Signature of person authorized to sign)		DIGNED		ريزيري في	LECTRONIC SIGNATURE	08/07/2020			
(Signature or person authorized to sign)				(Giginature or Contracting Officer)		I			

 CONTINUATION SHEET
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 OF

 68HERC19D0011/68HERC20F0055/P00002
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NAME OF OFFEROR OR CONTRACTOR

EM NO. (A)	SUPPLIES/SERVICES (B)	QUANTITY (C)	UNIT (D)	UNIT PRICE (E)	AMOUNT (F)
x/	ALT CL COR: Jorge Rangel	1/	(= /	(2)	(-/
	No IT Codes or FITARA necessary				
	TOCOR: BRYAN LOBAR Max Expire Date: 03/03/2021				
	LIST OF CHANGES:				
	Reason for Modification: The purpose of this				
	administrative mod is to extend the period of				
	performance to March 3, 2021.				
	Period Of Performance End Date changed from				
	18-NOV-20 to 03-MAR-21				
	Maximum Potential Expiration Date changed to: 03/03/2021				
	Payment:				
	RTP Finance Center				
	US Environmental Protection Agency				
	RTP-Finance Center (AA216-01)				
	109 TW Alexander Drive				
	www2.epa.gov/financial/contracts				
	Durham NC 27711				
	Period of Performance: 11/19/2019 to 03/03/2021				

AMENDMENT OF SOLICITATION/MODIFIC	ATION OF CO	NTRACT		CONTRACT ID CODE	PAGE	OF PAGES
2. AMENDMENT/MODIFICATION NO.	3. EFFECTIVE	DATE .	4. RE		5. PROJECT	NO. (If applicable)
P00003	See Bloc	k 16C				
6. ISSUED BY CODE	CAD		7. AI	DMINISTERED BY (If other than Item 6)	CODE	
CAD US Environmental Protection 26 West Martin Luther King I Mail Code: W136 Cincinnati OH 45268-0001						
8. NAME AND ADDRESS OF CONTRACTOR (No., street	t, county, State and I	ZIP Code)	,,, <u> </u> 9	A. AMENDMENT OF SOLICITATION NO.		1
National Academy of Sciences Attn: JAMES BURKE 500 FIFTH STREET NW WASHINGTON DC 200012736		-	9 x 16	B. DATED (SEE ITEM 11) 0A. MODIFICATION OF CONTRACT/ORDER N 8 HERC19D0011 58 HERC20F0055 0B. DATED (SEE ITEM 13)	0.	
CODE 041964057	FACILITY CODE			11/19/2019		
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	CT/ORDER IS MO H IN ITEM 14, PU	DDIFIED TO REFLECT TI RSUANT TO THE AUTH	HE A	DMINISTRATIVE CHANGES (such as changes Y OF FAR 43.103(b).		
D. OTHER (Specify type of modification	and authority)					
E. IMPORTANT: Contractor 🗵 is not	is required to	sign this document and	retur	copies to the issuing	a office.	
14. DESCRIPTION OF AMENDMENT/MODIFICATION DUNS Number: 041964057 New Task Order request under	(Organized by UC	CF section headings, inclu	luding	solicitation/contract subject matter where feasib	3	
Task Order: #TBD						
Title: Strategy for Review o Document CO: Mark Cranley			9S (Control Act Systematic R	eview G	uidance
CS: William Yates, Contract Acquisition Division: CAD	specialis	5 T				
TOCOR: Bryan Lobar						
ALTOCOR: Stephanie Griffin						
CL COR: Glennis Reslock						
Continued						
Except as provided herein, all terms and conditions of the	ne document refer	enced in Item 9 A or 10A	A, as h	neretofore changed, remains unchanged and in f	ull force and e	ffect.
15A. NAME AND TITLE OF SIGNER (Type or print)				NAME AND TITLE OF CONTRACTING OFFICE LILIAN M. Yates	CER (Type or μ	print)
15B. CONTRACTOR/OFFEROR		15C. DATE SIGNED			CCYRONIC SIGNATURE	16C. DATE SIGNED
(Signature of person authorized to sign)				(Signature of Contracting Officer)		08/07/2020

 CONTINUATION SHEET
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 OF

 68HERC19D0011/68HERC20F0055/P00003
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NAME OF OFFEROR OR CONTRACTOR

ITEM NO.	SUPPLIES/SERVICES	QUANTITY UNIT	UNIT PRICE	AMOUNT
(A)	(B)	(C) (D)	(E)	(F)
	ALT CL COR: Jorge Rangel	+ + +		
	No IT Codes or FITARA necessary			
	TOCOR: BRYAN LOBAR Max Expire Date: 03/31/2021			
	LIST OF CHANGES:			
	Reason for Modification: The purpose of this			
	administrative mod will be to correct the ending			
	date of the period of performance to March 31,			
	2021			
	Period Of Performance End Date changed from			
	03-MAR-21 to 31-MAR-21			
	Maximum Potential Expiration Date changed to :			
	03/31/2021			
	Payment:			
	RTP Finance Center			
	US Environmental Protection Agency			
	RTP-Finance Center (AA216-01)			
	109 TW Alexander Drive			
	www2.epa.gov/financial/contracts			
	Durham NC 27711			
	Period of Performance: 11/19/2019 to 03/31/2021			
NCN 7540 04 45	I	<u>ı 11</u>		ORTIONAL FORMACO (4.00)

AMENDMENT OF SOLICITATION/MODIFIC	ATION OF CO	ONTRACT		CONTRACT ID CODE	PAGE	OF PAGES
2. AMENDMENT/MODIFICATION NO.	3. EFFECTIVE	DATE	4. RE		5. PROJECT	NO. (If applicable)
P00004	See Bloo	ck 16C				
6. ISSUED BY CODE	CAD		7. A	DMINISTERED BY (If other than Item 6)	CODE	
CAD US Environmental Protection 26 West Martin Luther King D Mail Code: W136 Cincinnati OH 45268-0001						
8. NAME AND ADDRESS OF CONTRACTOR (No., street	t, county, State and	ZIP Code)	,,, <u>9</u>	A. AMENDMENT OF SOLICITATION NO.		1
National Academy of Sciences Attn: JAMES BURKE 500 FIFTH STREET NW WASHINGTON DC 200012736		·	9 x 1	B. DATED (SEE ITEM 11) 0A. MODIFICATION OF CONTRACT/ORDER N 8 HERC19D0011 58 HERC20F0055 0B. DATED (SEE ITEM 13)	0.	
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				MODIFIES THE CONTRACT/ORDER NO. AS DE		
A. THIS CHANGE ORDER IS ISSUED I ORDER NO. IN ITEM 10A.	PURSUANT TO:	(Specify authority) THE (CHAN	IGES SET FORTH IN ITEM 14 ARE MADE IN T	HE CONTRAC	T
B. THE ABOVE NUMBERED CONTRAC appropriation data, etc.) SET FORTH X C. THIS SUPPLEMENTAL AGREEMEN				DMINISTRATIVE CHANGES (such as changes of YOF FAR 43.103(b). RITY OF:	in paying office	,
D. OTHER (Specify type of modification	and authority)					
B. OTHER (opening type of mountainous)	and damonty)					
E. IMPORTANT: Contractor X is not	is required to	o sign this document and	retur	n copies to the issuing	g office.	
14. DESCRIPTION OF AMENDMENT/MODIFICATION DUNS Number: 041964057	(Organized by U	CF section headings, inclu	luding	solicitation/contract subject matter where feasib	ole.)	
New Task Order request under	NAS Con	tract #68HERC	19	D0011		
Task Order: #TBD		- 1				
Title: Strategy for Review o Document	f the To:	xic Substance	ès 1	Control Act Systematic R	eview G	uidance
CO: Mark Cranley						
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Acquisition Division: CAD						
TOCOR: Bryan Lobar						
ALTOCOR: Stephanie Griffin						
CL COR: Glennis Reslock						
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				lliam M. Yates		
15B. CONTRACTOR/OFFEROR	1	15C. DATE SIGNED		: UNITED STATES OF AMERICA		16C. DATE SIGNED
		IVO. DATE OIGNED		ريزيرت ريي	CCYRONIC SIGNATURE	09/29/2020
(Signature of person authorized to sign)				(Signature of Contracting Officer)		

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 OF

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NAME OF OFFEROR OR CONTRACTOR

EM NO. (A)	SUPPLIES/SERVICES (B)	QUANTITY (C)	UNIT (D)	UNIT PRICE (E)	AMOUNT (F)
	ALT CL COR: Jorge Rangel		П		
	No IT Codes or FITARA necessary				
	TOCOR: BRYAN LOBAR Max Expire Date: 03/31/2021				
	The purpose of this modification is to				
	incorporate the attached EPA blanket				
	administrative modification signed by Raoul Scott				
	on July 30, 2020. All other terms and conditions				
	remain unchanged.				
	Payment:				
	RTP Finance Center				
	US Environmental Protection Agency				
	RTP-Finance Center (AA216-01)				
	109 TW Alexander Drive				
	www2.epa.gov/financial/contracts Durham NC 27711				
	Period of Performance: 11/19/2019 to 03/31/2021				
		1			

AMEN	IDMENT OF SOLICITATION	MODIFICATION (OF CONTRACT	1. CONTRACT ID CO	DDE F	PAGE C	F PAGES
2. AMENDME	NT/MODIFICATION NUMBER	3. EFFECTIVE DATE 08/13/2020	4. REQUISITION/PURCHASE	E REQUISITION NUMBER	5. PROJECT I	NUMBER ((If applicable)
6. ISSUED BY	CODE		7. ADMINISTERED BY (If other than Item 6)	CODE		
OMS/ARM US Enviror 1200 Penr	Scott, Director I/OAS/Policy, Training and Over nmental Protection Agency, Mai nsylvania Avenue, NW n, DC 20004	sight Division I Code 3802R			L		
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To All EPA	Contractors			9B. DATED (SEI 10A. MODIFICA To all EPA (10B. DATED (SE	EITEM 11) TION OF CONTI	RACT/ORE	DER NUMBER
CODE		CILITY CODE				10. 0. 50.7	933
	11. THIS ITE	M ONLY APPLIES TO	AMENDMENTS OF S	OLICITATIONS			
or (c) By separa RECEIVED AT by virtue of this communication	ng items 8 and 15, and returning ate letter or electronic communication which is THE PLACE DESIGNATED FOR THE RECE amendment you desire to change an offer al makes reference to the solicitation and this a TING AND APPROPRIATION DATA (If require	ncludes a reference to the sol EIPT OF OFFERS PRIOR TO ready submitted, such change mendment, and is received p	icitation and amendment num THE HOUR AND DATE SPE may be made by letter or ele	bers. FAILURE OF YO ECIFIED MAY RESULT I ectronic communication, late specified.	UR ACKNOWLE IN REJECTION (provided each le	DGMENT OF YOUR	TO BE OFFER. If
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CHECK ONE	A. THIS CHANGE ORDER IS ISSUED PUR NUMBER IN ITEM 10A.		1 16 17		3.00	NTRACT	ORDER
X	B. THE ABOVE NUMBERED CONTRACT/(appropriation data, etc.) SET FORTH IN	ORDER IS MODIFIED TO RE ITEM 14, PURSUANT TO TH	FLECT THE ADMINISTRATI HE AUTHORITY OF FAR 43.1	VE CHANGES (such as 103(b).	changes in payi	ng office,	
	C. THIS SUPPLEMENTAL AGREEMENT IS		NT TO AUTHORITY OF:		· * · · · · · · · · · · · · · · · · · ·		
	D. OTHER (Specify type of modification and	autnority)	·		· · · · · · · · · · · · · · · · · · ·		
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This contra 4.2105, red Telecomm	act/order is being modified in acc quiring contracting officers to inc unications and Video Surveillanded for the full text version of FA	cordance with the ap lude FAR clause 52. ce Services or Equip	plicability instructions 204-25, Prohibition o ment.	s in interim FAR (on Contracting for	Case 2019-0 r Certain	009, an	d FAR
Except as provi	ded herein, all terms and conditions of the do	cument referenced in Item 9A	or 10A, as heretofore change	ed, remains unchanged	and in full force	and effect.	
	ND TITLE OF SIGNER (Type or print)		16A. NAME AND TITLE OF				•
			Raoul D. Scott, Dire	ctor Policy, Train	ing and Ove	ersight I	Division
15B. CONTRA	CTOR/OFFEROR	15C. DATE SIGNED	16B. UNITED STATES OF A		RAOUL SCOTT 1:40:17 -04'00'	16C. DA	TE SIGNED
(S	ignature of person authorized to sign)		(Signature	of Contracting Officer)			

52.204-25 Prohibition on Contracting for Certain Telecommunications and Video Surveillance Services or Equipment.

As prescribed in 4.2105(b) and in the applicability instructions in interim FAR Case 2019-009, insert the following clause:

Prohibition on Contracting for Certain Telecommunications and Video Surveillance Services or Equipment (Aug 2020)

(a) <u>Definitions</u>. As used in this clause—

Backhaul means intermediate links between the core network, or backbone network, and the small subnetworks at the edge of the network (e.g., connecting cell phones/towers to the core telephone network). Backhaul can be wireless (e.g., microwave) or wired (e.g., fiber optic, coaxial cable, Ethernet).

Covered foreign country means The People's Republic of China.

Covered telecommunications equipment or services means—

- (1) Telecommunications equipment produced by Huawei Technologies Company or ZTE Corporation (or any subsidiary or affiliate of such entities);
- (2) For the purpose of public safety, security of Government facilities, physical security surveillance of critical infrastructure, and other national security purposes, video surveillance and telecommunications equipment produced by Hytera Communications Corporation, Hangzhou Hikvision Digital Technology Company, or Dahua Technology Company (or any subsidiary or affiliate of such entities);
- (3) Telecommunications or video surveillance services provided by such entities or using such equipment; or
- (4) Telecommunications or video surveillance equipment or services produced or provided by an entity that the Secretary of Defense, in consultation with the Director of National Intelligence or the Director of the Federal Bureau of Investigation, reasonably believes to be an entity owned or controlled by, or otherwise connected to, the government of a covered foreign country.

Critical technology means-

- (1) Defense articles or defense services included on the United States Munitions List set forth in the International Traffic in Arms Regulations under subchapter M of chapter I of title 22, Code of Federal Regulations;
- (2) Items included on the Commerce Control List set forth in Supplement No. 1 to part 774 of the Export Administration Regulations under subchapter C of chapter VII of title 15, Code of Federal Regulations, and controlled-

- (i) Pursuant to multilateral regimes, including for reasons relating to national security, chemical and biological weapons proliferation, nuclear nonproliferation, or missile technology; or
 - (ii) For reasons relating to regional stability or surreptitious listening;
- (3) Specially designed and prepared nuclear equipment, parts and components, materials, software, and technology covered by part 810 of title 10, Code of Federal Regulations (relating to assistance to foreign atomic energy activities);
- (4) Nuclear facilities, equipment, and material covered by part 110 of title 10, Code of Federal Regulations (relating to export and import of nuclear equipment and material);
- (5) Select agents and toxins covered by part 331 of title 7, Code of Federal Regulations, part 121 of title 9 of such Code, or part 73 of title 42 of such Code; or
- (6) Emerging and foundational technologies controlled pursuant to section 1758 of the Export Control Reform Act of 2018 (50 U.S.C. 4817).

Interconnection arrangements means arrangements governing the physical connection of two or more networks to allow the use of another's network to hand off traffic where it is ultimately delivered (e.g., connection of a customer of telephone provider A to a customer of telephone company B) or sharing data and other information resources.

Reasonable inquiry means an inquiry designed to uncover any information in the entity's possession about the identity of the producer or provider of covered telecommunications equipment or services used by the entity that excludes the need to include an internal or third-party audit.

Roaming means cellular communications services (e.g., voice, video, data) received from a visited network when unable to connect to the facilities of the home network either because signal coverage is too weak or because traffic is too high.

Substantial or essential component means any component necessary for the proper function or performance of a piece of equipment, system, or service.

(b) Prohibition. (1) Section 889(a)(1)(A) of the John S. McCain National Defense Authorization Act for Fiscal Year 2019 (Pub. L. 115-232) prohibits the head of an executive agency on or after August 13, 2019, from procuring or obtaining, or extending or renewing a contract to procure or obtain, any equipment, system, or service that uses covered telecommunications equipment or services as a substantial or essential component of any system, or as critical technology as part of any system. The Contractor is prohibited from providing to the Government any equipment, system, or service that uses covered telecommunications equipment or services as a substantial or essential component of any system, or as critical technology as part of any system, unless an exception at paragraph (c) of this clause applies or the covered telecommunication equipment or services are covered by a waiver described in FAR 4.2104.

- (2) Section 889(a)(1)(B) of the John S. McCain National Defense Authorization Act for Fiscal Year 2019 (Pub. L. 115-232) prohibits the head of an executive agency on or after August 13, 2020, from entering into a contract, or extending or renewing a contract, with an entity that uses any equipment, system, or service that uses covered telecommunications equipment or services as a substantial or essential component of any system, or as critical technology as part of any system, unless an exception at paragraph (c) of this clause applies or the covered telecommunication equipment or services are covered by a waiver described in FAR 4.2104. This prohibition applies to the use of covered telecommunications equipment or services, regardless of whether that use is in performance of work under a Federal contract.
 - (c) Exceptions. This clause does not prohibit contractors from providing—
- (1) A service that connects to the facilities of a third-party, such as backhaul, roaming, or interconnection arrangements; or
- (2) Telecommunications equipment that cannot route or redirect user data traffic or permit visibility into any user data or packets that such equipment transmits or otherwise handles.
 - (d) Reporting requirement.
- (1) In the event the Contractor identifies covered telecommunications equipment or services used as a substantial or essential component of any system, or as critical technology as part of any system, during contract performance, or the Contractor is notified of such by a subcontractor at any tier or by any other source, the Contractor shall report the information in paragraph (d)(2) of this clause to the Contracting Officer, unless elsewhere in this contract are established procedures for reporting the information; in the case of the Department of Defense, the Contractor shall report to the website at https://dibnet.dod.mil. For indefinite delivery contracts, the Contractor shall report to the Contracting Officer for the indefinite delivery contract and the Contracting Officer(s) for any affected order or, in the case of the Department of Defense, identify both the indefinite delivery contract and any affected orders in the report provided at https://dibnet.dod.mil.
- (2) The Contractor shall report the following information pursuant to paragraph (d)(1) of this clause
- (i) Within one business day from the date of such identification or notification: the contract number; the order number(s), if applicable; supplier name; supplier unique entity identifier (if known); supplier Commercial and Government Entity (CAGE) code (if known); brand; model number (original equipment manufacturer number, manufacturer part number, or wholesaler number); item description; and any readily available information about mitigation actions undertaken or recommended.
- (ii) Within 10 business days of submitting the information in paragraph (d)(2)(i) of this clause: any further available information about mitigation actions undertaken or recommended. In addition, the Contractor shall describe the efforts it undertook to prevent use or submission of covered telecommunications equipment or services, and any additional efforts that will be incorporated to prevent future use or submission of covered telecommunications equipment or services.

(e) *Subcontracts*. The Contractor shall insert the substance of this clause, including this paragraph (e) and excluding paragraph (b)(2), in all subcontracts and other contractual instruments, including subcontracts for the acquisition of commercial items.

(End of clause)

			ORDER FO	R SU	PPLIES OR SERV	/ICES					PAGE (F PAGES	3		
IMPORTANT:	Mark all	packages and papers w	vith contract ar	nd/or ord	ler numbers.	15					1		15		
1. DATE OF ORI	DER	2. CONTRACT NO. (If and 68HERC19D0011	у)						6. SHIP TO:		•				
12/05/20	19	68HERC19D0011				a. NAI	ME OF C	ONSIGNEE							
3. ORDER NO.			4 REOLIIS	SITION/P	EFERENCE NO.										
68HERC20	F0062		See S	nese ne s ee mest		Off	ice c	of Research a	nd Develo	ວm∈	ent				
5. ISSUING OFF	FICE (Addr	ress correspondence to)					REETADI Envir	DRESS onmental Pro	tection A	— ger	ncy				
US Envir	onmen	tal Protectio	n Agency			26 1	West	Martin Luthe	r King Dr	iv∈	e				
		n Luther King	Drive												
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7. TO: JAME	S BUR	KE				f. SHIF	VIA								
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						Please	furnish t	he following on the terms	-		side only of thused subject to t				
A. CITY NASHINGTON B. ACCOUNTING AND APPROPRIATION DATA See Schedule G. STATE DC 2000127								specified on both sides of on the attached sheet, if			ditions of the a	bove-numb	pered		
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								10. REQUISITIONING OFFICE Office of Research and Development							
	See Schedule 11. BUSINESS CLASSIFICATION (Check appropriate box(es))						ice c	or Research a	na pevero		⊖11 € 12. F.O.B. POII	NT			
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			NOE.		14. GOVERNMENT B/LT	NO.		ON OR BEFORE (Da 12/04/2020			10. DISCOU	VI TERINO			
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1						QUANT		UNIT				QU.	ANTITY		
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ORDER FOR SUPPLIES OR SERVICES SCHEDULE - CONTINUATION

IMPORTANT: Mark all packages and papers with contract and/or order numbers.

DATE OF ORDER CONTRACT NO.

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ORDER NO.

12/05/20	019 68HERC19D0011				68HERC2	OF0062	
ITEM NO.	SUPPLIES/SERVICES	QUANTITY	12(2)(15.2) - 10	UNIT		AMOUNT	QUANTITY
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0001	Admin Office: CAD US Environmental Protection Agency 26 West Martin Luther King Drive Mail Code: W136 Cincinnati OH 45268-0001 Period of Performance: 12/05/2019 to 12/04/2020 New Task Order Request under NAS Contract #68HERC19D0011. Funding for New NAS Task					10,000.00	
	Order - (NERL) Title: Support for the Disaster Research Response Action Collaborative; \$5,000.00 NAS Contract: 68HERC19D0011 TO No.: TBD TOCOR: Sarah Taft ALTOCOR: Erin Silvestri CO: Mark Cranley CS: William Yates Acquisition Division: CAD CL COR: Glennis Reslock ALT CL COR: Jorge Rangel NO IT Codes or FITARA necessary NOTE: PR-ORD-19-02421 (NHSRC) \$5,000.00 is in tandem to PR-ORD-19-02416 (NERL) \$5,000.00 for GRAND TOTAL: \$10,000.00 Task Order ALL required supporting documents are located in EAS PR-ORD-19-02416 Supporting Documents. Requisition No: PR-ORD-19-02416, PR-ORD-19-02421 Accounting Info: 19-20-C-26UU000-000FK6XR1-2532-26A6A-1 926UUE048-001 BFY: 19 EFY: 20 Fund: C Budget Org: 26UU000 Program (PRC): 000FK6XR1 Budget (BOC): 2532 Cost: 26A6A DCN - Line ID: 1926UUE048-001 Funding Flag: Partial Funded: \$5,000.00 Accounting Info:						
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ORDER FOR SUPPLIES OR SERVICES SCHEDULE - CONTINUATION

PAGE NO

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IMPORTANT: Mark all packages and papers with contract and/or order numbers.

DATE OF ORDER CONTRACT NO. 12/05/2019 68HERC19D0011

ORDER NO. 68HERC20F0062

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	000F72 Budget (BOC): 2532 Job #:					
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PERFORMANCE WORK STATEMENT

National Academy of Sciences (NAS) Contract #68HERC190011

> PR-ORD-19-02416 (NERL) PR-ORD-19-02421 (NHSRC)

Task Order #68HE0C20F0062

I. TITLE: Support for the Disaster Research Response Action Collaborative

EAS Short Title: Disaster Research Response Action Collaborative

II. Task Order Contracting Officer Representative(s):

Task Order Contracting Officer	Alternate Task Order Contracting Officer
Representative (TOCOR)	Representative (Alt. TOCOR)
Name: Sarah Taft	Name: Erin Silvestri
Office: USEPA/ORD/NHSRC/TCAD	Office: USEPA/ORD/NHSRC/TCAD
26 West Martin Luther King Drive	26 West Martin Luther King Drive
Mail Code: NG16	Mail Code: NG16
Cincinnati, OH 45268	Cincinnati, OH 45268
PI 512 560 7027	DI 512 560 7610

Email: taft.sarah@epa.gov Email: silvestri.erin@epa.gov

III. PERIOD OF PERFORMANCE: 12 Months from date of TO award

IV. PURPOSE OF TASK ORDER

EPA is requesting two (2) meetings of the Action Collaborative on Disaster Science working group. The outcome of these meetings will be an outline of processes, priorities, and opportunities for advancing the development and implementation of research following a disaster including ensuring community engagement in process and to define processes for expanding and enhancing a coordinated network of disaster researchers.

V. BACKGROUND

The National Academies of Science (NAS) is convening an Action Collaborative on Disaster Science in collaboration with National Institutes of Health and other federal agencies to: 1) foster improved processes and platforms for developing and implementing needed time-critical data collection and research in response to disasters; 2) identify evidence-based mechanisms and opportunities for conducting and sharing information gathered from public health research during disasters; 3) engage cross-sector stakeholders in development, refinement, and promotion of disaster research opportunities and best practices; 4) provide a venue to support the development and maintenance of a rapid response mechanism for the National Academies to continue to meet sponsor needs for convening, idea generation and information sharing during the initial stages of a public health emergency.

Action Collaboratives engage participants with similar interests and responsibilities in cooperative activities that analyze in-depth high-priority issues, advance identified goals, and make progress on recommendations from previous National Academies consensus reports. Collaboratives are participant-driven, action-oriented activities that foster collaboration and information sharing among members and external thought leaders and stakeholders. Collaboratives may:

- identify issues of common interest and marshal needed leadership, expertise, and resources;
- highlight potential paths forward through, e.g., individually authored (or small group) literature summaries or discussion papers or through the convening of technical discussions;
- engage in cooperative development of tools needed for progress;
- incubate and pilot-test novel approaches; and
- develop proposals for formal workshops and studies for consideration by the National Academies.

Each action collaborative is an ad hoc activity, associated with a Forum or Roundtable, at the National Academies. The work it produces does not necessarily represent the views of any one organization, the parent Forum, or the National Academies, and has not been subjected to the review procedures

The Action Collaborative will include members, chosen for their professional expertise in developing, conducting, and promoting disaster-related research as well as their general scientific and/or disaster medicine/public health/emergency management credentials. Expertise may include grant management (e.g., as a Principal Investigator), emergency management, homeland security, environmental health and geosciences, toxicology,

behavioral/psychosocial/mental health, data science/ bioinformatics, health care, public health, public policy, risk communications, health disparities and community engagement, and human subjects' research/bioethics.

VI. SCOPE OF WORK

The National Academies of Science (NAS) is convening an Action Collaborative on Disaster Science in collaboration with National Institutes of Health and other federal agencies, including the Environmental Protection Agency (EPA). EPA shall participate in two (2) meetings on-site at NAS that shall bring together interested stakeholders for the purpose of improving needed data collection, disaster research processes, and facilitating multidisciplinary networks of disaster researchers. The outcome of these meetings shall be an outline of processes, priorities, and opportunities for advancing the development and implementation of research following a disaster including ensuring community engagement in process and to define processes for expanding and enhancing a coordinated network of disaster researchers.

VII. DESCRIPTION OF TASKS

Task 1 – Kick-off Call for TO

Convene a meeting with the Task Order Contracting Officer Representative (TOCOR), and relevant ORD technical staff, to review the issues to be discussed at future Action Collaborative meetings. This meeting shall occur within 14 days of acceptance of this task order.

Task 1. Deliverables

Task	SubTask	Deliverable	Schedule
1	NA	TO Kickoff Call Meeting minutes	Within 14 days of acceptance of this TO

Task 2 – Action Collaborative Meetings

Organize and support two on-site Action Collaborative meetings at the NAS headquarters in the next 10 months. The meetings will bring together interested stakeholders for the purpose of improving needed data collection and disaster research processes and facilitating multidisciplinary networks of disaster researchers.

Task 2. Deliverables

Task	SubTask	Deliverable	Schedule
2	NA	Action Collaborative Meeting Minutes	Within 14 days from end of meetings

Task 3 – Draft Report

Draft report outlining/defining processes, priorities, and opportunities for advancing the development and implementation of research following a disaster, including discussions of community engagement and data sharing practices 90 days following the second meeting.

Task 3. Deliverables

Task	SubTask	Deliverable	Schedule
3	NA	Draw report	Within 90 days following the second meeting

VIII. ACCEPTANCE CRITERIA

The Contractor shall prepare high quality products and that are reproducible and transparent. Figures submitted shall be of high quality similar to presentations developed for national scientific forums and should be formatted as jpeg or TIFF files. Deliverables shall be edited for grammar, spelling, and logic flow. The technical information shall be reasonable complete and presented in a logical, readable manner. Text deliverables shall be provided in Microsoft Word 2010 or compatible format.

AMENDMENT OF SOLICITATION/MODIFIC	СТ	1. CONTRACT ID CODE	OF PAGES			
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CAD US Environmental Protection 26 West Martin Luther King D Mail Code: W136 Cincinnati OH 45268-0001	Agency			_		
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CODE 041964057	FACILITY CODE		12/05/2019			
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E. IMPORTANT: Contractor X is not	is required to sign this	s document and ret	urn copies to the issu	uing office.		
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Continued Except as provided herein, all terms and conditions of the 15A. NAME AND TITLE OF SIGNER (Type or print) 15B. CONTRACTOR/OFFEROR		1 V	s heretofore changed, remains unchanged and 6A. NAME AND TITLE OF CONTRACTING OF Filliam M. Yates 6B. UNITED STATES OF AMERICA	FICER (Type or p		
(Signature of person authorized to sign)		,	(Signature of Contracting Officer)	SIGNATURE	09/29/2020	

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52.204-25 Prohibition on Contracting for Certain Telecommunications and Video Surveillance Services or Equipment.

As prescribed in 4.2105(b) and in the applicability instructions in interim FAR Case 2019-009, insert the following clause:

Prohibition on Contracting for Certain Telecommunications and Video Surveillance Services or Equipment (Aug 2020)

(a) <u>Definitions</u>. As used in this clause—

Backhaul means intermediate links between the core network, or backbone network, and the small subnetworks at the edge of the network (e.g., connecting cell phones/towers to the core telephone network). Backhaul can be wireless (e.g., microwave) or wired (e.g., fiber optic, coaxial cable, Ethernet).

Covered foreign country means The People's Republic of China.

Covered telecommunications equipment or services means—

- (1) Telecommunications equipment produced by Huawei Technologies Company or ZTE Corporation (or any subsidiary or affiliate of such entities);
- (2) For the purpose of public safety, security of Government facilities, physical security surveillance of critical infrastructure, and other national security purposes, video surveillance and telecommunications equipment produced by Hytera Communications Corporation, Hangzhou Hikvision Digital Technology Company, or Dahua Technology Company (or any subsidiary or affiliate of such entities);
- (3) Telecommunications or video surveillance services provided by such entities or using such equipment; or
- (4) Telecommunications or video surveillance equipment or services produced or provided by an entity that the Secretary of Defense, in consultation with the Director of National Intelligence or the Director of the Federal Bureau of Investigation, reasonably believes to be an entity owned or controlled by, or otherwise connected to, the government of a covered foreign country.

Critical technology means-

- (1) Defense articles or defense services included on the United States Munitions List set forth in the International Traffic in Arms Regulations under subchapter M of chapter I of title 22, Code of Federal Regulations;
- (2) Items included on the Commerce Control List set forth in Supplement No. 1 to part 774 of the Export Administration Regulations under subchapter C of chapter VII of title 15, Code of Federal Regulations, and controlled-

- (i) Pursuant to multilateral regimes, including for reasons relating to national security, chemical and biological weapons proliferation, nuclear nonproliferation, or missile technology; or
 - (ii) For reasons relating to regional stability or surreptitious listening;
- (3) Specially designed and prepared nuclear equipment, parts and components, materials, software, and technology covered by part 810 of title 10, Code of Federal Regulations (relating to assistance to foreign atomic energy activities);
- (4) Nuclear facilities, equipment, and material covered by part 110 of title 10, Code of Federal Regulations (relating to export and import of nuclear equipment and material);
- (5) Select agents and toxins covered by part 331 of title 7, Code of Federal Regulations, part 121 of title 9 of such Code, or part 73 of title 42 of such Code; or
- (6) Emerging and foundational technologies controlled pursuant to section 1758 of the Export Control Reform Act of 2018 (50 U.S.C. 4817).

Interconnection arrangements means arrangements governing the physical connection of two or more networks to allow the use of another's network to hand off traffic where it is ultimately delivered (e.g., connection of a customer of telephone provider A to a customer of telephone company B) or sharing data and other information resources.

Reasonable inquiry means an inquiry designed to uncover any information in the entity's possession about the identity of the producer or provider of covered telecommunications equipment or services used by the entity that excludes the need to include an internal or third-party audit.

Roaming means cellular communications services (e.g., voice, video, data) received from a visited network when unable to connect to the facilities of the home network either because signal coverage is too weak or because traffic is too high.

Substantial or essential component means any component necessary for the proper function or performance of a piece of equipment, system, or service.

(b) Prohibition. (1) Section 889(a)(1)(A) of the John S. McCain National Defense Authorization Act for Fiscal Year 2019 (Pub. L. 115-232) prohibits the head of an executive agency on or after August 13, 2019, from procuring or obtaining, or extending or renewing a contract to procure or obtain, any equipment, system, or service that uses covered telecommunications equipment or services as a substantial or essential component of any system, or as critical technology as part of any system. The Contractor is prohibited from providing to the Government any equipment, system, or service that uses covered telecommunications equipment or services as a substantial or essential component of any system, or as critical technology as part of any system, unless an exception at paragraph (c) of this clause applies or the covered telecommunication equipment or services are covered by a waiver described in FAR 4.2104.

- (2) Section 889(a)(1)(B) of the John S. McCain National Defense Authorization Act for Fiscal Year 2019 (Pub. L. 115-232) prohibits the head of an executive agency on or after August 13, 2020, from entering into a contract, or extending or renewing a contract, with an entity that uses any equipment, system, or service that uses covered telecommunications equipment or services as a substantial or essential component of any system, or as critical technology as part of any system, unless an exception at paragraph (c) of this clause applies or the covered telecommunication equipment or services are covered by a waiver described in FAR 4.2104. This prohibition applies to the use of covered telecommunications equipment or services, regardless of whether that use is in performance of work under a Federal contract.
 - (c) Exceptions. This clause does not prohibit contractors from providing—
- (1) A service that connects to the facilities of a third-party, such as backhaul, roaming, or interconnection arrangements; or
- (2) Telecommunications equipment that cannot route or redirect user data traffic or permit visibility into any user data or packets that such equipment transmits or otherwise handles.
 - (d) Reporting requirement.
- (1) In the event the Contractor identifies covered telecommunications equipment or services used as a substantial or essential component of any system, or as critical technology as part of any system, during contract performance, or the Contractor is notified of such by a subcontractor at any tier or by any other source, the Contractor shall report the information in paragraph (d)(2) of this clause to the Contracting Officer, unless elsewhere in this contract are established procedures for reporting the information; in the case of the Department of Defense, the Contractor shall report to the website at https://dibnet.dod.mil. For indefinite delivery contracts, the Contractor shall report to the Contracting Officer for the indefinite delivery contract and the Contracting Officer(s) for any affected order or, in the case of the Department of Defense, identify both the indefinite delivery contract and any affected orders in the report provided at https://dibnet.dod.mil.
- (2) The Contractor shall report the following information pursuant to paragraph (d)(1) of this clause
- (i) Within one business day from the date of such identification or notification: the contract number; the order number(s), if applicable; supplier name; supplier unique entity identifier (if known); supplier Commercial and Government Entity (CAGE) code (if known); brand; model number (original equipment manufacturer number, manufacturer part number, or wholesaler number); item description; and any readily available information about mitigation actions undertaken or recommended.
- (ii) Within 10 business days of submitting the information in paragraph (d)(2)(i) of this clause: any further available information about mitigation actions undertaken or recommended. In addition, the Contractor shall describe the efforts it undertook to prevent use or submission of covered telecommunications equipment or services, and any additional efforts that will be incorporated to prevent future use or submission of covered telecommunications equipment or services.

(e) *Subcontracts*. The Contractor shall insert the substance of this clause, including this paragraph (e) and excluding paragraph (b)(2), in all subcontracts and other contractual instruments, including subcontracts for the acquisition of commercial items.

(End of clause)

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ORDER FOR SUPPLIES OR SERVICES SCHEDULE - CONTINUATION

PAGE NO

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IMPORTANT: Mark all packages and papers with contract and/or order numbers. DATE OF ORDER CONTRACT NO. ORDER NO. 68HERC19D0011 68HERC20F0083 12/19/2019 ITEM NO. SUPPLIES/SERVICES QUANTITY UNIT UNIT **AMOUNT** QUANTITY ACCEPTED ORDERED PRICE (d) (a) (b) (c) (e) (g) 12/18/2021 Admin Office: US Environmental Protection Agency 26 West Martin Luther King Drive Mail Code: W136 Cincinnati OH 45268-0001 Period of Performance: 12/19/2019 to 12/18/2021 0001 Request New Task Order under National 148,920.00 Academy of Sciences (NAS) Contract #68HERC19D0011 Title: "NAS-TRB Core Support" TOCOR: Luke Vermeulen (OAR-OTAQ-TCD) CO: Mark Cranley CS: William Yates Acquisition Division: MSN SPT ORD ORDERS CL COR: Glennis Reslock ALT COR: Jorge Rangel No IT Codes or FITARA necessary Requisition No: PR-OAR-20-00061, PR-OAR-20-00291 Accounting Info: 19-20-C-56F1-000A61-2505-2056F90173-00 1 BFY: 19 EFY: 20 Fund: C Budget Org: 56F1 Program (PRC): 000A61 Budget (BOC): 2505 DCN - Line ID: 2056F90173-001 Funding Flag: Partial Funded: \$140,000.00 Accounting Info: 20-21-C-56F1-000A61-2505-2056F00014-00 1 BFY: 20 EFY: 21 Fund: C Budget Org: 56F1 Program (PRC): 000A61 Budget (BOC): 2505 DCN - Line ID: 2056F00014-001 Funding Flag: Partial Funded: \$8,920.00

TOTAL CARRIED FORWARD TO 1ST PAGE (ITEM 17(H))

\$148,920.00

PERFORMANCE WORK STATEMENT

National Academy of Sciences (NAS)
Contract #68HERC19D0011
PR-OAR-20-00061
Task Order #68HE0C20F0083

I. TITLE: NAS Transportation Research Board Core Support

EAS Short Title: NAS TRB Core Support

II. Task Order Contracting Officer Representative(s):

Task Order Contracting Officer
Representative (TOCOR)
Alternate Task Order Contracting Officer
Representative (Alt. TOCOR)

Name: Luke Vermeulen

Office: OAR-OTAQ-TCD

Name: Nicholas Witkowski

Office: OAR-OTAQ-TDC

2000 Traverwood Drive 2000 Traverwood Drive Ann Arbor, MI 48197 Ann Arbor, MI 48197

Email: Vermeulen.Luke@epa.gov | **Email:** Witkowski.Nicholas@epa.gov

III. PERIOD OF PERFORMANCE: Two (2) years from date of Task Order issuance.

IV. PURPOSE OF TASK ORDER

The Transportation Research Board (TRB) is a program unit of the National Academy of Sciences (NAS). It is also one of six major divisions of the National Research Council (NRC), which serves as an independent adviser to the federal government and other stakeholders on scientific and technical questions of national importance, and which is jointly administered by the National Academy of Sciences, the National Academy of Engineering, and the Institute of Medicine.

TRB provides leadership in transportation innovation and progress through research and information exchange, conducted within a setting that is objective, interdisciplinary, and multimodal. TRB is supported by state transportation departments, federal agencies, and other organizations and individuals interested in the development of transportation.

The purpose of this task order is to provide support to the TRB at the "Core" level and to receive from TRB the commensurate benefits of such support. "Core" level support is financial support that federal, state and local government agencies provide to TRB in order to support its core technical activities. This includes transportation research, education, and the development of solutions to problems and issues facing transportation professionals.

V. BACKGROUND

In support of its regulatory mandates, the U.S. Environmental Protection Agency (EPA) has active research at the nexus of transportation and the environment including issues of air quality, greenhouse gas emissions, alternative transportation fuels, smart growth, and energy security.

A resource to the nation and to the transportation community worldwide, TRB provides an extensive portfolio of services that also greatly benefit the work of the EPA. The EPA has benefited greatly over the past decade through its continued support of TRB as it furthers its research efforts.

VI. SCOPE OF WORK

TRB shall provide the EPA with all the benefits commensurate with "Core" level program support. These specific benefits are defined in the below description of tasks and shall be available immediately to the EPA when "Core" level support begins. EPA will provide TRB with two (2) calendar years of "Core" level support from the date of issuance of this Task Order.

VII. DESCRIPTION OF TASKS

- **Task 1.1:** TRB shall provide unlimited registrations to the TRB Annual Meeting for all EPA employees
- **Task 1.2:** If requested by the Task Order Contracting Officer Representative (TOCOR), TRB shall provide EPA with meeting facilities and an exhibit booth at the Annual Meeting (based on availability).
- Task 1.3: TRB shall provide the EPA with representation on the TRB Executive Committee
- **Task 1.4:** Delivery of all TRB hard copy publications (up to 200 per year). TRB shall maintain and update a mailing list for distribution of publications to EPA staff as designated by the TOCOR.
- **Task 1.5:** Full online access to all the Transportation Research Records: "Journal of the Transportation Research Board" papers published since 1999. The Record Series consists of the papers from the Annual Meeting that are chosen for publication.
- **Task 1.6:** TRB standing technical committees currently sponsor or co-sponsor 25-30 conferences and more than 100 workshops annually on a wide range of subjects. EPA employees shall be eligible for discounted registration fees for many of these conferences.
- **Task 1.7:** EPA employees shall have free access to all collected TRB Annual Meeting PowerPoint presentations, posters, and the Annual Meeting Compendium of Papers.

Task 1.8: TRB shall schedule visits with EPA and establish liaison representatives as appropriate. A summary of the results of these visits is printed annually in the TRNews - which is distributed to more than 10,000 subscribers.

Task 1.9: All EPA employees shall have access to TRB's Library and to TRID. <u>TRID</u> is a newly integrated database that combines the records from TRB's Transportation Research Information Services (TRIS) Database and the OECD's Joint Transport Research Centre's International Transport Research Documentation (ITRD) Database. TRID provides access to over 900,000 records of transportation research worldwide – with more than 50,000 records linked to full-text documents. TRID is also indexed with a standardized vocabulary from the Transportation Research Thesaurus (TRT). The Research in Progress (RiP) records in TRID are available as a separate searchable database through TRB. RiP has expanded to include international research projects and university research.

Task 1. Deliverables

Task	Deliverable	Schedule
1.1	Unlimited registrations to the TRB Annual Meeting for all EPA employees.	All deliverables will be immediately available upon Task
1.2	Meeting facilities and an exhibit booth at the Annual Meeting (based on availability).	Order issuance and for the duration of the Task Order
1.3	Representation on the TRB Executive Committee.	
1.4	Delivery of all TRB hard copy publications (up to 200 per calendar year).	
1.5	Full online access to all the Transportation Research Records: Journal of the Transportation Research Board papers published since 1999.	
1.6	Discounted registration fees for standing technical committee conference and workshops.	
1.7	Free access to all collected Annual Meeting PowerPoint presentations, posters, and the Annual Meeting Compendium of Papers.	
1.8	Visit with EPA and establish liaison representatives as appropriate.	
1.9	Full access to TRB's Library and to TRID.	

VIII. ACCEPTANCE CRITERIA

The Contractor shall prepare high quality products and that are reproducible and transparent. Figures submitted shall be of high quality similar to presentations developed for national scientific forums and should be formatted as jpeg or TIFF files. Deliverables shall be edited for grammar, spelling, and logic flow. The technical information shall be reasonable complete and presented in a logical, readable manner. Text deliverables shall be provided in Microsoft Word 2016 or compatible format.

AMENDMENT OF SOLICITATION/MODIFIC	ATION OF CON	ITRACT		1. CONTRACT ID CODE	PAGE OF PAGES			
2. AMENDMENT/MODIFICATION NO.	3. EFFECTIVE DA	ATE 4.	4. REQU	ISITION/PURCHASE REQ. NO.	5. PRO	JECT NO.	1 4 (If applicable)	
P00001	See Block	16C					. ,,	
6. ISSUED BY CODE			7. ADMI	NISTERED BY (If other than Item 6)	CODE			
CAD US Environmental Protection 26 West Martin Luther King I Mail Code: W136 Cincinnati OH 45268-0001	_							
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8. NAME AND ADDRESS OF CONTRACTOR (No., street, county, State and ZIP Code) National Academy of Sciences Attn: JAMES BURKE 500 FIFTH STREET NW WASHINGTON DC 200012736				MENDMENT OF SOLICITATION NO. PATED (SEE ITEM 11) MODIFICATION OF CONTRACT/ORDER NO. 1ERC 19D0011 1ERC 20F0083 DATED (SEE ITEM 13)).			
CODE 041964057	FACILITY CODE		12	/19/2019				
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CHECK ONE A. THIS CHANGE ORDER IS ISSUED ORDER NO. IN ITEM 10A.	E RECEIPT OF OFFI change an offer alre- nce to the solicitation uired) IODIFICATION OF COPURSUANT TO: (Sp. CT/ORDER IS MODE H IN ITEM 14, PURS	ERS PRIOR TO THE HO eady submitted, such che in and this amendment, a contracts/orders. Decify authority) THE CI IFIED TO REFLECT THE SUANT TO THE AUTHO	IOUR AN hange m and is re . IT MOD CHANGE HE ADM ORITY C	ID DATE SPECIFIED MAY RESULT IN REJECTION AS DESIDED THE CONTRACT/ORDER NO. AS DESIDED TO SET THE CONTRACT/ORDER NO. AS DESIDED TO SET	CTION Contion, protection, protection. CRIBED IE CONT	DF YOUR vided DIN ITEM		
D. OTHER (Specify type of modification	and authority)							
E. IMPORTANT: Contractor X is not	is required to s	ign this document and re	return _	copies to the issuing	office.			
14. DESCRIPTION OF AMENDMENT/MODIFICATION DUNS Number: 041964057 National Academy of Sciences \$140,000; POC: Luke Vermeule TOCOR: LUKE VERMEULEN Max Ex The purpose of this modification signed by Raoul unchanged.	(NAS); 68 en (OAR-OTA pire Date: ation is to	HERC19D0011; Q-TCD) 12/18/2021 incorporate	; Ne	w Task Order; "NAS-TRB	Core	.nistr	cative	
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15B. CONTRACTOR/OFFEROR	15	C. DATE SIGNED			CCYRO	NIC	C. DATE SIGNED	
(Signature of person authorized to sign)			1.5	(Signature of Contracting Officer)		0 !	9/29/2020	

 CONTINUATION SHEET
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 OF

 68HERC19D0011/68HERC20F0083/P00001
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 14

NAME OF OFFEROR OR CONTRACTOR

ITEM NO. (A)	SUPPLIES/SERVICES (B)	QUANTITY (C)	UNIT (D)	UNIT PRICE (E)	AMOUNT (F)
	Payment:				
	RTP Finance Center				
	US Environmental Protection Agency				
	RTP-Finance Center (AA216-01) 109 TW Alexander Drive				
	www2.epa.gov/financial/contracts				
	Durham NC 27711				
	Period of Performance: 12/19/2019 to 12/18/2021				

AMEN	IDMENT OF SOLICITATION	MODIFICATION (OF CONTRACT	1. CONTRACT ID CO	DDE F	PAGE C	F PAGES
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OMS/ARM US Enviror 1200 Penr	Scott, Director I/OAS/Policy, Training and Over nmental Protection Agency, Mai nsylvania Avenue, NW n, DC 20004	sight Division I Code 3802R			L		
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CODE		CILITY CODE				10. 1. 10.1	933
	11. THIS ITE	M ONLY APPLIES TO	AMENDMENTS OF S	OLICITATIONS			
or (c) By separa RECEIVED AT by virtue of this communication	ng items 8 and 15, and returning ate letter or electronic communication which is THE PLACE DESIGNATED FOR THE RECE amendment you desire to change an offer al makes reference to the solicitation and this a TING AND APPROPRIATION DATA (If require	ncludes a reference to the sol EIPT OF OFFERS PRIOR TO ready submitted, such change mendment, and is received p	icitation and amendment num THE HOUR AND DATE SPE may be made by letter or ele	bers. FAILURE OF YO ECIFIED MAY RESULT I ectronic communication, late specified.	UR ACKNOWLE IN REJECTION (provided each le	DGMENT OF YOUR	TO BE OFFER. If
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X	B. THE ABOVE NUMBERED CONTRACT/(appropriation data, etc.) SET FORTH IN	ORDER IS MODIFIED TO RE ITEM 14, PURSUANT TO TH	FLECT THE ADMINISTRATI HE AUTHORITY OF FAR 43.1	VE CHANGES (such as 103(b).	changes in payi	ng office,	
	C. THIS SUPPLEMENTAL AGREEMENT IS		NT TO AUTHORITY OF:		· * · · · · · · · · · · · · · · · · · ·		
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Except as provi	ded herein, all terms and conditions of the do	cument referenced in Item 9A	or 10A, as heretofore change	ed, remains unchanged	and in full force	and effect.	
	ND TITLE OF SIGNER (Type or print)		16A. NAME AND TITLE OF				•
			Raoul D. Scott, Dire	ctor Policy, Train	ing and Ove	ersight I	Division
15B. CONTRA	CTOR/OFFEROR	15C. DATE SIGNED	16B. UNITED STATES OF A		RAOUL SCOTT 1:40:17 -04'00'	16C. DA	TE SIGNED
(S	ignature of person authorized to sign)		(Signature	of Contracting Officer)			

52.204-25 Prohibition on Contracting for Certain Telecommunications and Video Surveillance Services or Equipment.

As prescribed in 4.2105(b) and in the applicability instructions in interim FAR Case 2019-009, insert the following clause:

Prohibition on Contracting for Certain Telecommunications and Video Surveillance Services or Equipment (Aug 2020)

(a) <u>Definitions</u>. As used in this clause—

Backhaul means intermediate links between the core network, or backbone network, and the small subnetworks at the edge of the network (e.g., connecting cell phones/towers to the core telephone network). Backhaul can be wireless (e.g., microwave) or wired (e.g., fiber optic, coaxial cable, Ethernet).

Covered foreign country means The People's Republic of China.

Covered telecommunications equipment or services means—

- (1) Telecommunications equipment produced by Huawei Technologies Company or ZTE Corporation (or any subsidiary or affiliate of such entities);
- (2) For the purpose of public safety, security of Government facilities, physical security surveillance of critical infrastructure, and other national security purposes, video surveillance and telecommunications equipment produced by Hytera Communications Corporation, Hangzhou Hikvision Digital Technology Company, or Dahua Technology Company (or any subsidiary or affiliate of such entities);
- (3) Telecommunications or video surveillance services provided by such entities or using such equipment; or
- (4) Telecommunications or video surveillance equipment or services produced or provided by an entity that the Secretary of Defense, in consultation with the Director of National Intelligence or the Director of the Federal Bureau of Investigation, reasonably believes to be an entity owned or controlled by, or otherwise connected to, the government of a covered foreign country.

Critical technology means-

- (1) Defense articles or defense services included on the United States Munitions List set forth in the International Traffic in Arms Regulations under subchapter M of chapter I of title 22, Code of Federal Regulations;
- (2) Items included on the Commerce Control List set forth in Supplement No. 1 to part 774 of the Export Administration Regulations under subchapter C of chapter VII of title 15, Code of Federal Regulations, and controlled-

- (i) Pursuant to multilateral regimes, including for reasons relating to national security, chemical and biological weapons proliferation, nuclear nonproliferation, or missile technology; or
 - (ii) For reasons relating to regional stability or surreptitious listening;
- (3) Specially designed and prepared nuclear equipment, parts and components, materials, software, and technology covered by part 810 of title 10, Code of Federal Regulations (relating to assistance to foreign atomic energy activities);
- (4) Nuclear facilities, equipment, and material covered by part 110 of title 10, Code of Federal Regulations (relating to export and import of nuclear equipment and material);
- (5) Select agents and toxins covered by part 331 of title 7, Code of Federal Regulations, part 121 of title 9 of such Code, or part 73 of title 42 of such Code; or
- (6) Emerging and foundational technologies controlled pursuant to section 1758 of the Export Control Reform Act of 2018 (50 U.S.C. 4817).

Interconnection arrangements means arrangements governing the physical connection of two or more networks to allow the use of another's network to hand off traffic where it is ultimately delivered (e.g., connection of a customer of telephone provider A to a customer of telephone company B) or sharing data and other information resources.

Reasonable inquiry means an inquiry designed to uncover any information in the entity's possession about the identity of the producer or provider of covered telecommunications equipment or services used by the entity that excludes the need to include an internal or third-party audit.

Roaming means cellular communications services (e.g., voice, video, data) received from a visited network when unable to connect to the facilities of the home network either because signal coverage is too weak or because traffic is too high.

Substantial or essential component means any component necessary for the proper function or performance of a piece of equipment, system, or service.

(b) Prohibition. (1) Section 889(a)(1)(A) of the John S. McCain National Defense Authorization Act for Fiscal Year 2019 (Pub. L. 115-232) prohibits the head of an executive agency on or after August 13, 2019, from procuring or obtaining, or extending or renewing a contract to procure or obtain, any equipment, system, or service that uses covered telecommunications equipment or services as a substantial or essential component of any system, or as critical technology as part of any system. The Contractor is prohibited from providing to the Government any equipment, system, or service that uses covered telecommunications equipment or services as a substantial or essential component of any system, or as critical technology as part of any system, unless an exception at paragraph (c) of this clause applies or the covered telecommunication equipment or services are covered by a waiver described in FAR 4.2104.

- (2) Section 889(a)(1)(B) of the John S. McCain National Defense Authorization Act for Fiscal Year 2019 (Pub. L. 115-232) prohibits the head of an executive agency on or after August 13, 2020, from entering into a contract, or extending or renewing a contract, with an entity that uses any equipment, system, or service that uses covered telecommunications equipment or services as a substantial or essential component of any system, or as critical technology as part of any system, unless an exception at paragraph (c) of this clause applies or the covered telecommunication equipment or services are covered by a waiver described in FAR 4.2104. This prohibition applies to the use of covered telecommunications equipment or services, regardless of whether that use is in performance of work under a Federal contract.
 - (c) Exceptions. This clause does not prohibit contractors from providing—
- (1) A service that connects to the facilities of a third-party, such as backhaul, roaming, or interconnection arrangements; or
- (2) Telecommunications equipment that cannot route or redirect user data traffic or permit visibility into any user data or packets that such equipment transmits or otherwise handles.
 - (d) Reporting requirement.
- (1) In the event the Contractor identifies covered telecommunications equipment or services used as a substantial or essential component of any system, or as critical technology as part of any system, during contract performance, or the Contractor is notified of such by a subcontractor at any tier or by any other source, the Contractor shall report the information in paragraph (d)(2) of this clause to the Contracting Officer, unless elsewhere in this contract are established procedures for reporting the information; in the case of the Department of Defense, the Contractor shall report to the website at https://dibnet.dod.mil. For indefinite delivery contracts, the Contractor shall report to the Contracting Officer for the indefinite delivery contract and the Contracting Officer(s) for any affected order or, in the case of the Department of Defense, identify both the indefinite delivery contract and any affected orders in the report provided at https://dibnet.dod.mil.
- (2) The Contractor shall report the following information pursuant to paragraph (d)(1) of this clause
- (i) Within one business day from the date of such identification or notification: the contract number; the order number(s), if applicable; supplier name; supplier unique entity identifier (if known); supplier Commercial and Government Entity (CAGE) code (if known); brand; model number (original equipment manufacturer number, manufacturer part number, or wholesaler number); item description; and any readily available information about mitigation actions undertaken or recommended.
- (ii) Within 10 business days of submitting the information in paragraph (d)(2)(i) of this clause: any further available information about mitigation actions undertaken or recommended. In addition, the Contractor shall describe the efforts it undertook to prevent use or submission of covered telecommunications equipment or services, and any additional efforts that will be incorporated to prevent future use or submission of covered telecommunications equipment or services.

(e) *Subcontracts*. The Contractor shall insert the substance of this clause, including this paragraph (e) and excluding paragraph (b)(2), in all subcontracts and other contractual instruments, including subcontracts for the acquisition of commercial items.

(End of clause)